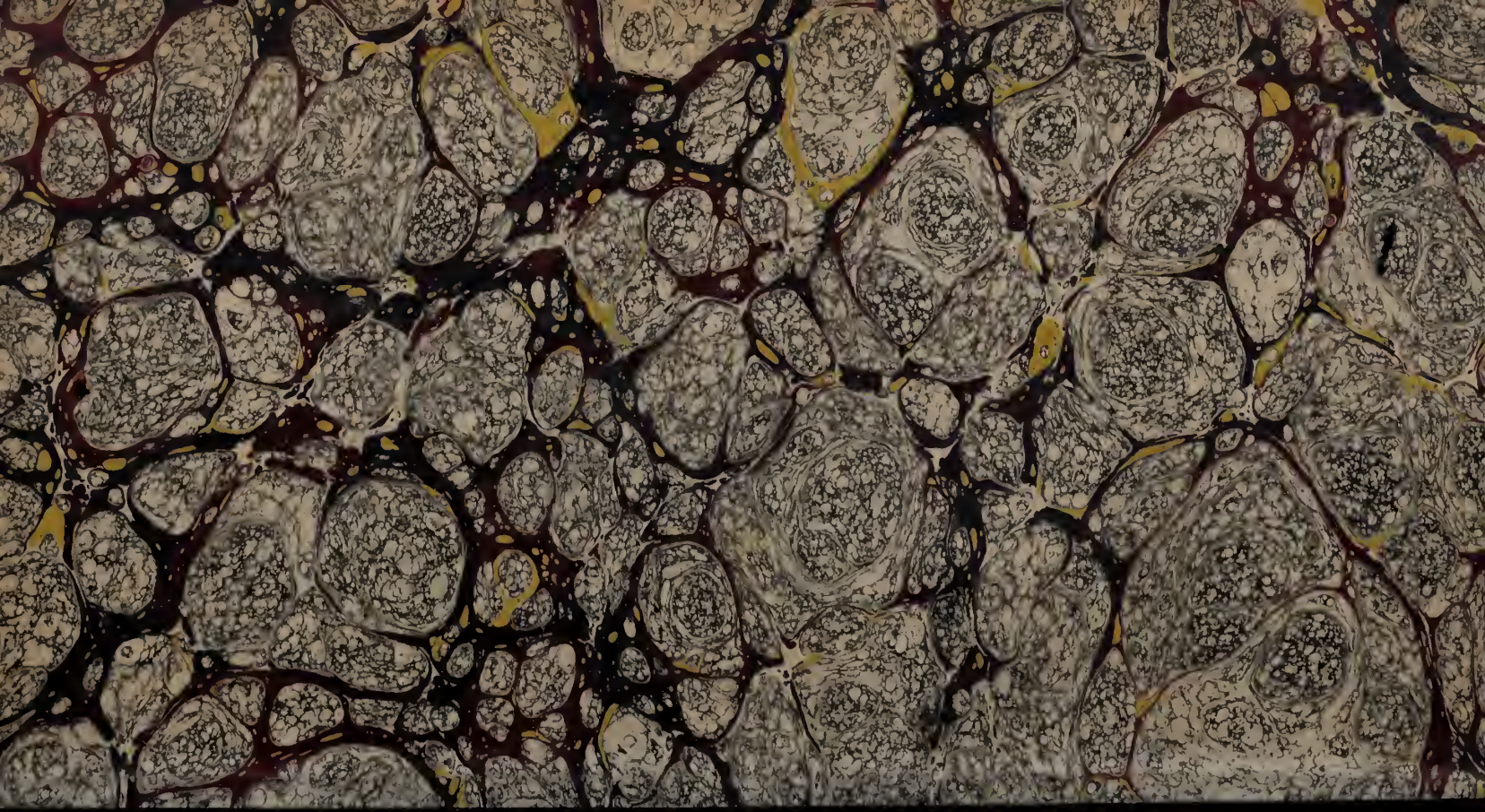

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Vol. XVIII. MAY 1913. No. 1.

MISSISSIPPI MEDICAL MONTHLY

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AND ITS COMPONENT SOCIETIES.

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MISSISSIPPI MEDICAL MONTHLY

VOL. XVIII. MAY 1913. NO. 1.

PRESIDENT'S ADDRESS.

S. W. GLASS M.D.,
LYON.

To stand before this distinguished body as your President and realize the great honor that you have bestowed upon me; causes me to feel the deep sense of gratitude and appreciation very keenly. In the outset I wish to express my appreciation of the work of the section chairmen in their earnest efforts to make the program a success. I wish also to express my deep gratitude to the Councilors, also secretaries of the different component societies for their untiring efforts in perfecting county organizations, and through their diligent work and efforts they have succeeded in bringing many new men into our fold. They have also shown and demonstrated their ability to shake the annual dues from the pockets of many of our tardy members. And last, but by no means least, our worthy State Secretary shall always have a warm place in my heart for his untiring and valuable assistance, as well as his loyalty to the organization. I sincerely hope you will not think it an evidence of egotism when I suggest some changes that appeal to me, and will be for the betterment, effectiveness and upbuilding of our association, which I shall now briefly enumerate.

I have been impressed for quite a while of the advisability of a change in our method of selecting members of the State Board of Health; personally I think very favorably of the method adopted in our sister state, Arkansas. In that state the Medical Society is permitted to name three men from among themselves from each congressional district and the Governor is required by law, to name one of these men from each congressional district; that state has only seven congressional districts, therefore, there is no chance for a deadlock or a tie vote in their board. In this state you well know, we have eight congressional districts, therefore, should we stop with a copy of the Arkansas law of course we would be liable to a dead-

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lock or a tie vote; to overcome this probable unpleasant condition make the president of the State Medical Association an ex-officio member thereby creating the ninth member, and gentlemen, this appeals to me as a sufficient number to compose the State Board of Health. If this suggestion should become a law, you can readily see that the State Board of Health will be taken from politics and placed under the complete jurisdiction and control of the State Medical Association where it justly belongs.

Our present methods of selecting and compensating county health officers are inadequate; as it now stand their salaries range from one hundred and fifty to fifteen hundred dollars per annum. This as you well know is left entirely with the discretion of the Board of Supervisors of a given county. While the board is generally composed of upright, honest, business men, they have only the faintest conception of the duties of the county health officer, whom they suppose is a production of the State Board of Health, who is of no particular use except in cases of epidemics of contagious or infectious diseases. Yet he would be universally condemned should he hesitate to jeopardize his life and that of his family in visiting places stricken with such diseases. In my humble opinion one chief cause of the predominance of low salaries is the inability of the county health officer to comply with the demands of the public during such epidemics. This in a large measure could in my opinion be overcome by changing the laws so as to create beat health officers in each county. The salary to be regulated by the State Board of Health. I feel sure that every physician present tonight, especially those doing work in the rural districts has at some time experienced in his professional career during an epidemic the failure to get prompt and effective assistance and co-operation from the county health officers on account of inaccessibility of the county health officer, hence the above change mentioned seems to be a sane and sensible solution to the problem. From a standpoint of reason the State Medical Association should defray the expenses of the delegates to the American Medical Association. To be creditably represented we should select such men as can give the Association the best representation, therefore, the members who are usually selected are forced to undergo a great personal sacrifice to devote their time and energy to the welfare of our great body, and a compensation by the way of expenses appeals to me from a standpoint of right and justice. There seems to have arisen

some oppostion to the Medico-Legal practice act, from what standpoint I cannot ascertain. Malpractice suits are growing more common every day and those present tonight have assurance that they will not be the next victim; at present there are several now pending before the Mississippi courts. As you well know it is only a nominal assessment which we can all bear without any financial embarrassment. It would indeed be very gratifying to know that should trouble arise we will have the support and backing of so strong an organization. If this information should gain a foothold with the masses they unquestionably would hesitate before resorting to legal action.

One of our greatest shortcomings today is our lack of care for the tubercular patient. Frequently we see some unfortunate person, who is stricken with this awful malady, and by reason his inability to earn his daily bread is reduced to a state of pauperism with no place to go for life's sustenance as well as medical treatment. The doors of most of our charity hospitals are closed to them, so they are forced if not fortunate enough to possess some revenue for support to depend on the charity of the public for sustenance until the Mighty Reaper comes to their relief and conveys them to the great beyond. For a long time I have agitated the establishment of a State Tubercular farm to be situated in South Mississippi, for in that section more relief is offered in a climatic way, and the state could purchase a tract of land in that section for a reasonable price, where ideal quarters could be established, where the latest method of treatment could be resorted to, and this land could be converted into an ideal truck farm to be worked by those who are able and in that way made largely self-supporting. I have recently suggested the plan to our Governor and he most heartily approves and pledges his support in behalf of this or any other law looking to the care and the welfare of our tubercular patients. How many physicians especially from the delta portion of the state have witnessed the tubercular negro on the large plantation walking from house to house expectorating on the walls and floors, thereby spreading the tubercular bacilli broadcast only to gain admittance to some susceptible body. Under our present laws we can only stand by with hands folded so to speak for we have no relief to offer.

During the next meeting of our state legislature I want to ask that each and every member agree to give all assistance to the passage of all measures suggested by our Association. Keep constantly in touch with your representative from your county

and urge him to vote for all measures suggested by our Associatisu. Past experience has taught me that such work was the chief cause of the passage of our recent Medical laws now on the statutes.

Now, in conclusion I want to say that personally I am very much gratified over the present condition of our Association, at present the register shows more paid up members than ever before in the history of the organization. Several reports yet, that have not been received, will greatly increase the number, and gentlemen of the association when I surrender the gavel of the Association to my successor I want each member present tonight to know and feel that I do not expect to relinquish my interest and zeal in the Association, on the other hand the experience derived during the past year has caused me to realize the importance of loyalty and untiring work to accomplish the great task that confronts us, and now I want to ask each and every one to work for the welfare and upbuilding of this great organization.

ORATION.

C. D. MITCHELL M.D.,

PONTOTOC.

Mr. President, Ladies and Gentlemen:—

It is said that when Edmond Burke in the zenith of his power appeared before an audience at the University of Glascow, his fearless voice faltered with the beatings of his heart, and for a moment he stood before that cultured assemblage as speechless as a marble statute.

If Edmond Burke, the renowned statesman, the illustrious scholar, the profound thinker, the eloquent orator, whose massive character was sufficient to shake a throne, and whose giant intellect moved like a conqueror among the mightiest thinkers of all Europe; if this high, proud scion of wealth and nobility, could fail and stand there abashed and as mute as the walls about him; excusable, indeed, am I for the manifest embarrassment which I feel in coming before this Association—composed as it is of the greatest, ablest and most learned physicians of any state. Men, who in their profession, have no peers. And, especially, when I realize that I can present to them nothing new or original. And also in coming before an audience such

as this, upon whose attuned ears every false note that I utter will grate harshly.

But I love this Association, which, in the past, has honored me far more highly than I could possibly deserve or merit. And I feel that not to respond to the call of your President would show a want of appreciation on my part and I would be derelict in my duty. Hence upon the shoulders of the President of this Association must rest the censure for the ordeal you must undergo in listening to me for the next few minutes.

The prophet, Isaiah, the most pre-eminent of all the old prophets, coming into office during a period of great national declension from truth and purity and godliness and healthfulness, foretold some events nigh at hand, which the living witnesses of his own generation were able to verify by their own observations; while others of his prophecies, stretching far into the future, have continued to receive an exact, but progressive fulfillment during centuries.

And looking forward still up to the present day, the prophet foreseeing the great advancement of the medical scince; foreknowing the knowledge which it would offer for the prevention of disease; realizing that this would be an age when it is proper to live, and that diseases and death would, in a large part be unnecessary, caused him, I believe, to ask his people this question, "Why should ye be stricken any more?" And then follow with the assertion, "And the inhabitant shall not say, 'I am sick' "; and the thoughts contained in these words of Isaiah, the greatest of the prophets, shall be the subject upon which I shall speak to you tonight.

WHY SHOULD YE BE STRICKEN ANY MORE?

Since the beginning of time; since the fall of Adam, it has been the lot of man to suffer disease and affliction and death. Pestilence and plagues and contagious and infectious diseases have surrounded him, and at every stage of the existence waylaid him.

And in the early ages of the world medicine was regarded either as a mystery or an imposition, and the calling was esteemed a servile one. And whenever sickness over-powered one, the incantations of magic and the unmeaning rites of a fanatical religion were appealed to by both prince and peasant.

And the progress of medicine was slow and its achievements were few, until early in the seventeenth century when an era of progress began; the outcome of the discovery of the

circulation of the blood; yet at this time the views of the physicians were crude, because their pathology was false; their treatment was empirical because it had no fixed scientific basis. And I doubt not that the physicians of that day merited Voltaire's definition as "A man who poured drugs of which he knew nothing, into bodies of which he knew less."

But after devoting ourselves for many long years to the study and verification of symptoms, to the research of anatomical lesions, to the study of physiology and pathology, we have lately come to the study of the origin of disease. And as a result of this study appears the dawn of a new era when medicine, unfettered of superstition and mystery, unhampered by tradition, stands out today an almost perfect science; the greatest, the grandest, the noblest vocation of the sons of man; and rises to take her place among the sciences, there to shine with a luster undimmed by doubts and calumnies, which in the past have cast their shadows upon her fair escutcheon.

We are living today in the most progressive and most prosperous age in which it was ever man's fortune to live. Our farms are producing more crops; the plains more cattle; the mines more ore; the factories more goods; the fields of labor more wages; the railways more dividends and commerce more profit than ever before. We are making new discoveries and ingenuious inventions; traveling at new speed and adding new luxuries and conveniences for the benefit of mankind. Our opportunities are greater and rewards of success larger than ever in the history of the world. We are taking the gigantic powers of modern progress and turning it in a thousand ways to the public good. And taking advantage of the knowledge, which medicine affords today, man can look forward to an almost diseaseless world, where parasites that maim and kill, will not waylay him as they have waylaid mankind at every stage of his existence.

And though science discloses the fact that germs, bacteria, disease-producing microbes surround us, are constantly in and about us; in our mouths, in our nostrils, and in our intestines; in food we eat, in the water we drink, and in the air we breathe; yet, if the proper hygenic and sanitary precautions are exercised; if the inexorable laws of nature are implicitly obeyed, we may survive in the struggle for existence, attain and retain the blessings of health, round out the sums of years allotted to man, and live and bless and benefit mankind.

We read in the New Testament that a cry was once heard

coming from a poor, miserable leper, saying, "Lord if thou wilt thou canst make me clean," and for centuries, this same cry has gone up from poor, suffering, afflicted humanity, and the medical profession, through its persistent efforts, believing that "Cleanliness is next to Godliness," through sanitary science touches a disease-stricken world, and says, "Be thou clean," and diseased localities are rendered healthy. Many diseases are eradicated and diminished; contagious and infectious diseases are under control, and millions of dollars and millions of lives are annually saved to our people.

Smallpox, the most terrible disease that ever ravaged a world and "that leaves its hidden traces of power on those it does not slay," has been conquered. Cholera has been confined to its home in the valley of the Ganges. Yellow fever has been stayed from ravaging our population, and driven from civilized countries. We know how to guard against diphtheria and scarlet fever and cholera infantum and typhoid fever and tuberculosis. And with this knowledge before us, I tonight ask the question, "Why should ye be stricken any more?"

But, notwithstanding all this, at this age if knowledge and advancement, we are continually dying and suffering from preventable diseases. Last year approximately there were six hundred and eighty thousand needless deaths in the United States. Despite the justly applauded triumphs of modern medicine, microbic diseases cause the death, in the United States alone, of at least one hundred individuals every hour of the day, year in and year out.

Ninety per cent. of all sickness in children under one year of age is due to ignorance and carelessness, and is preventable. We shudder yet with horror over the slaughter of innocents by Herod, and yet we sit sublime and passive and allow thousands and thousands more to die of preventable disease.

The extinction of life at the end of its natural cycle, after its course has been finished and its allotted work has been done, can scarcely be regretted; but the lives of these little ones, cut off before they are well begun, are an absolute loss to the community, of the extent of which we can have no conception. And there is no single question, political or economic, which ought to be of such vital concern as this tremendous sacrifice of human life.

It is a melancholy fact that tuberculosis, a disease which presents more complex economic problems than any other known disease, from which neither age, sex nor condition of life

enjoys immunity; a disease that is absolutely preventable and unnecessarily claims as its victims one-tenth of the human race. It is a social problem wider and more important than any other problem that confronts us. We can't look in any direction but that it appears. Though we know what causes the disease; though we know how to stop the spread of the infection; though we know how to cure it, yet it claims more than three thousand victims each week in the United States alone. If your entire family comprises ten individuals, the changes are that at least one member will ultimately die of consumption.

So much has been said and written on this subject and so little enthusiasm has been aroused, that it is extremely discouraging to those who have the matter at heart, but results can only be obtained by persistent efforts in keeping the subject constantly before the people. The fight against tuberculosis must become more and more a fight for better homes, more play grounds, better food and more of it; shorter hours for work, clean and better work rooms and better education in the laws of health. The community must awaken to the fact that its fate is in its own hands and that the best medicine is not physic, but good food, fresh air, sunshine, pure water and personal cleanliness.

Every person who has a throat or bronchial trouble, who is losing strength and flesh and weight, whose afternoon temperature taken at different hours is higher than it should be; who don't come back to par after having pneumonia or grippe, or extra bad cold, should go at once to his family physician to find the cause; and the physician should make his diagnosis early and tell his patient that he has consumption; inform him fully and freely as to the nature of the disease, and tell him that he can be cured. Don't advise a change of climate. These people can be cured at home. Many a hopeful sufferer has gone west in a strange land, surrounded by persons to whom his fate is a matter of indifference. He too often recognizes in those who administer to his wants individuals who perform ungraciously for hire services which in the home he left would have been cheerfully rendered for affection. The human wrecks only recently observed scattered over the desert waste of the great southwest bear witness to this statement, as well as many wanderers seeking health in the mountainous wilderness of some distant state. Struggling for the mere necessities of life, with death an inexorable companion, and all the future

dimmed by the shadow of waiting Charon. To those people "Climate" with its exhilarating dry air, blue sky and bright sunshine is but a "Will-O-the-Wisp. Keep them at home. Instruct them how to live. Teach them that sunlight, good food, rest and freedom from worry are the antidotes for the disease. Teach them that to expectorate where others may bring the infection into a house on shoes or skirts; where it may dry and become a powder to be sent in the air to be breathed is a murderous practice.

Not long since I visited one of the most flourishing schools of my county and found a building poorly lighted and badly ventilated and terribly overcrowded. I found teaching this school a splendid, highly educated young woman; but far advanced with tuberculosis. Shut up in this building, drinking out of the same cup, spitting disease and death dealing microbes all over the room occupied by those young children! And one of the trustees who elected that teacher was a physician.

A leper menaces the health and lives of those with whom he comes in contact very much less than does one suffering with consumption. How absolutely illogical and untenable is our position when we lift up our hands in holy horrow while listening to accounts of the ignorant Kanakas, who eat, sleep and smoke with their leprous relatives and hide them from the minions of the law, who have come to separate the sick from the well, while we associate in the same way with people who have consumption.

Another of human nature's greatest and most dreaded foes is typhoid fever, a disease that is preventable and entirely unnecessary. Yet, last year in the United States 135,000 wage earners suffered from this malady, entailing a loss in wages of $3,660,000 to the sufferers and a great deal more than that to the country.

And while we lay stress and should lay stress upon infected water and milk as a cause, too little attention is given to the house fly. In any campaign for sanitation and healthful conditions in the city or county, getting rid of the housefly is absolutely necessary. No more efficient agency for the transmission of infectious filth of all sorts could have been devised by the most ingenious imagination. This pestilent insect, microscopically examined, ranks as one of the most loathsome of all creatures.

During the Spanish-American war, a regiment of healthy

young men was mustered into service. Glorying in its record for health and fitness, this regiment was sent to Chickamauga Park. Their camp was laid out in a isolated grove, high and well drained. Its drinking water came from a deep well and from first to last was pronounced microscopically free from infection. The food was nutritious. The rank and file were tough and bronzed and hard as nails. Within a few weeks, however, the surgeons were diagnosing typhoid fever; the hospital tent was crowded with patients; and now and then the word came that this man and that man had died in the general hospital. The perplexed surgeons walked the camp from one side to the other every day, but there was none wise enough to point his finger at the cause. They all guessed and guessed wrong. It is as clear as daylight now. The Chickamauga woods were full of typhoid when the regiment with its health record set up its tents. Within three days the new camp was full of flies which had come from the woods. And had the surgeons examined the fuzzy feet of a few of the flies, they would have found typhoid germs which they vainly sought in the well.

It cannot be too strongly emphasized upon our people that the housefly is the deadliest wild animal, the most ferocious beast of prey, that the human species has to contend with. It cannot be too strongly impressed upon the people that every fly that enters our house may be heavily ladened with the germs of typhoid fever or some other intestinal disease.

Not long since, one of the big, strong, conservative life insurance companies made this statement: "I would not do any business in South Carolina, Florida, Alabama, Louisiana, or Mississippi." This was published as a boast; a reason why men in other sections of the country should buy life insurance in this particular company. It is a reproach that can be wiped out. It ought to be a standing challenge to every legislator, to every public-spirited citizen, in fact every citizen in the states named; for every disease peculiar to these regions can be eradicated by sanitation. Then why shall ye be stricken any more?

The curious and discouraging fact is that most people are strangely oblivious to the immediate dangers that lie about them, while they manifest keen interest in spectacular calamities that are far less momentous. Thus everyone read with horror a few weeks ago that ten thousand Turks were reported to have fallen in a single battle with the Bulgarians. We were horrified and dumbfounded at the awfulness of the Titanic disaster in which hundreds of people lost their lives. The whole

country was shocked and almost paralyzed at the terrible loss of lives and property caused by the floods and cyclone which recently swept over the country. The newspapers scare-headed the accounts from ocean to ocean. But no newspaper thought to mention the fact, nor did we stop to think, that many times ten thousand victims had fallen the same days before microbic foes.

Not to speak of the unavoidable suffering and sorrow; the drain upon the material resources of the people of this country every year from preventable sickness and death is almost beyond the conception of the finite mind. In actual dollars and cents it is estimated to be more than the taxes paid for all purposes. Then how can our people be taught that the most fruitful task for the promotion of life, liberty and pursuit of happiness is to cleanse the country so that no one can be sick except by his own personal transgression against right living? How can the average man or woman be made to take as much interest in the battle of the microbes, which vitally concerns their own lives and the lives of their children, as they now take in the bickerings of political parties. The repeal of the fourteenth and fifteenth amendments, the records of scandal and murders, and the eradication of the tick and boll weevil How can a public sentiment be created that will value man as highly as animals?

I believe that the key to the situation is the County Health Officer, who in every instance should be an educated man; capable, efficient and well qualified, who commands and merits the esteem and confidence of the people of the county in which he lives; and whose judgment and whose opinion is considered safe and reliable. He should be a man who should not wait for epidemics to come, but who will grasp such problems as are presented by the milk and water supplies, soil pollution, the eradication of flies and mosquitoes, the cleaning out of tuberculosis, hook-worm and the like. He should visit and lecture on hygiene and sanitation to every school in his county at least twice a year. He should attend the teachers institutes of his county and lecture to them upon school sanitation and the prevention of disease. And the teachers should be required to stand an examination on hygiene conducted by the health officer. If this is done no child will grow up with a dangerous ignorance of right living. A new standard and conscience of health will be set up in a single generation.

The fundamental work has been begun by the State Board

of Health, and the magnificent work done by Dr. Leathers and his associates is being appreciated by the people. And they have accomplished a vast deal of good, but until capable health officers are had in each county to push this work on we shall continue to have hundreds of thousands of deaths from preventable disease. I do not believe that there can be an effective health service on any basis until there is a capable health officer in every county who will devote his whole time to the service.

No matter where a ship may be along the American coast; no matter how dark or cold or stormy the night, the coast guard is on his watch, patrolling the nearest beach or rocky cliff. This man, always on guard, becomes a power to whom all ship owners and passengers are indebted. And so should the health officer be always on guard and be paid a competent salary for his full time. And when this is done he will become a power for the protection of life and health. For he can soon educate his people to realize that the responsibility for the protection of the public against epidemic and endemic diseases lies upon the government as a sacred trust. He can bring them to realize that it is just as much a state or municipal obligation to prevent disease as to prevent crime. That it is as much the duty of the state to protect your homes against the invasion of disease as to protect your property from the encroachments of a thief. And then in due time the Department of Health will rest upon a plane equal to that now occupied by the Department of Justice. And then that millenium of happiness shall have been realized which the prophet, Isaiah, had, had in mind when he said: "And the inhabitant shall not say, 'I am sick.'"

And though it may be that in a majority of the counties of the state the supervisors are so near-sighted and so stingy that they will not pay sufficient salaries; yet, I believe there are good and competent men in every county, who, as a matter of duty will take the office, and after a few years, when they have proven to the people their worth and ability to prevent sickness; the people themselves will rise up and demand that they be paid a salary commensurate with their ability. And then, let every physician, as good and dutiful citizens, place no obstacle in the way of the health officer, but rather come to his aid and render to him every assistance in our power. Let us do our part in the prevention of sickness and in the preservation of health and in the saving of life.

I have somewhere read that on one occasion Alexander the Great was on a boat with a party of friends, when suddenly

one of the party fell overboard. And Alexander the Great at once leaped into the water and saved his friend. And he was declared by all present a hero; and he proclaimed it the happiest day of his life, because he had saved a life. And in this crusade against disease if we are careful and thoughtful and render every assistance in our power, if we aid in all the sanitary precautions, we are as much and far greater heroes than was Alexander the Great; for without a doubt, we have assisted in saving the life and preserving the health of thousands of our people. And though the world may never crown us as heroes, though we may never receive any reward for our services; yet, in due time, when ages upon ages, out numbering the ocean drops, shall have passed away; when mercy shall fold away the certain of the far to come, and reveal brighter thrones and brighter crowns; when love shall have triumphed over hatred and truth rehearse her victories over a regenerated world; angels will come and brighten our obscurity and whisper to us that welcome plaudit, words born out of God's loving heart, high and hopeful: "Well done thou good and faithful servant."

Society Proceedings.

East Mississippi Four County Medical Society convened in Amory Tuesday, March 18th, at 2 p. m., in the parlors of the T. P. A. Hotel, President McCown in the chair and Secretary Underwood on duty. The secretary, by request of Dr. J. W. Gray of Clarksdale, asked the society to pass upon the merits of the medical defense act. After a round of discussion and explanation it was approved by the entire membership present without a dissenting vote. The society went on record as unanimously favoring the constitutional amendments offered by Councilor Bullitt at the 1912 meeting of the State Association. On motion of Dr. Bryan clinics were now received and Dr. Dobbs of Nettleton presented a skin case and Dr. Bryan a throat case. Dr. F. E. Lee read a paper on "Indications And Therapeutic Uses Of Lobelia," and Dr. Underwood one on "The Appetite And Bodily Economy As Internal Conditions Of Health." Both papers were freely discussed. Dr. W. C. Spencer of Verona introduced a resolution of endorsement of the actions of the minority membership in the late unpleasantness but by personal request of Dr. Bryan reluctantly withdrew the

resolution. The members reported a most enjoyable time and the Amory physicians lived up to their past reputation as hosts.

F. J. Underwood.

Mississippi State Medical Association

OFFICERS 1913-14.

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H. F. SPROLES ..... Vicksburg
J. J. WILSON ..... Coldwater

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E. F. HOWARD ..... Vicksburg

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Council.

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President Feemster announces the following appointments:

Committee on Public Policy and Legislation.

Dr. R. S. Curry, Jackson.

Committee on Publication.

Drs. M. H. Bell, Vicksburg, and J. P. Wall, Jackson.

Committeee on Scientific Work.

Drs. B. B. Martin, Vicksburg, and F. J. Underwood, Nettleton.

Committee on Medical Education.

D. W. Jones, Brookhaven; J. W. Young Grenada; D. J. Williams, Gulfport.

MISSISSIPPI MEDICAL MONTHLY.

E. F. HOWARD B.S., M.D., Editor and Publisher.

S. MYERS M.D., Business Manager.

ASSOCIATE EDITORS

F. J. UNDERWOOD, M D., Nettleton. H. L. SUTHERLAND M.D., Benoit.

H. M. FOLKES M.D., Biloxi. M. H. BELL M.D., Vicksburg.

OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

The forty-sixth annual session of the State Medical Association, held at Vicksburg April 8th., 9th. and 10th., passes into history with flying colors. It was not, by some fifty, the largest meeting we have ever had, but was certainly a good one. The program was a good one, a little heavy perhaps, so that long hours were necessary, but no one seemed to mind that very much. Only once was an allusion made to the long hours, and that was after midnight of the second day and then it was more on account of a desire to get into the meeting of the House of Delegates, where election of officers was to take place, than to go to bed.

We were all glad to see some time-tried friends from neighboring states notably J. B. Elliott Jr., E. L. McGehee and E. D. Martin from Louisiana; E. H. Martin—the man who put Hot Springs on the map; and Frank Jones, E. C. Ellett, Frank Smythe, J. B. McElroy and E. M. Holder of Memphis; and we much regretted the absence of J. A. Crisler and Eugene Johnson of Memphis, who were under promise never to miss a meeting and for whose benefit the arrangement committee had some especially cold bottles and an unusually high-power car for the park trip.

It was so thoroughly understood who was to be the next president that comparatively little comment or speculation was indulged in and when the nominating committee made its report and Drs. Little and Kittrell withdrew in favor of Dr. L. C. Feemster of Nettleton everybody took it as a mater of course. As will be seen by the notices printed elsewhere in

this issue, the new president has justified the choice of the committee by taking hold with the energy and vigor that has made him one of the sources of pride of the East Mississippi Four-County Society and we may confidently expect that "the world do move" during his administration.

We wish to advise inquiring friends, and especially our neighbors, that the Mississippi State Medical Association is "doing as well as can be expected" and has today twelve more members than ever before. Lest we be considered visionary we will not insist on the statement that Secretary Underwood of the East Mississippi Four-County has informed us that in honor of Dr. Feemster's accession to the presidency he will send in the dues of twenty more members before the year is out. We don't want to appear unduly insistent, but after this public acknowledgement it is certainly "up to Underwood" to get them.

The Warren County Medical Society, the host of the 1913 meeting, wishes to express its appreciation of the many kind things that have been said to its members by the guests. Having invited you to our city "we done our damdest, angels could do no more" and while some of you ran away without using your automobile tickets we hope that it was only because you found more congenial amusement elsewhere.

The secretary desires to call the attention of all the members, and particularly the county secretaries, to a ruling of the council that appears in its report, see minutes of the House of Delegates, regarding back dues. The secretary is, under that ruling, unable to accept dues for 1912 at this time nor to accept 1913 dues after Dec. 31st. So all must learn to pay regularly, annually, if they want to derive the benefits of membership.

Mississippi State Medical Association.

MINUTES OF THE HOUSE OF DELEGATES.

The tenth annual session of the House of Delegates of the Mississippi State Medical Association was called to order in the Walnut Street Theatre, Vicksburg, Monday, April 7th., at 2 P. M. by President S. W. Glass of Lyon.

The chair declared the presence of a quorum.

The secretary read his report as follows:

SECRETARY'S REPORT.

Vicksburg, Miss., April 7th. 1913.

To The House Of Delegates,

Mississippi State Medical Association:—

Gentlemen:—Beyond routine matters, which as they go to committees have been arranged as separate exhibits, your secretary has nothing of special moment to report beyond certain information gathered at the conference of state secretaries held in Chicago last Ooctober. It will be remembered that at our last meeting the Council suggested in its report the advisability of paying the secretary's expenses to Atlantic City in June to the meeting of the Association of State Secretaries and Editors, and that in the debate on the question your secretary contended that it would be a waste of money. By this it was not inteded to convey the idea, as one or two friends suggested, that the Mississippi secretary thought he had nothing more to learn about the conduct of his office, but that the meeting in question was little more than a social gathering of a couple of hours duration and that little or no real business would be accomplished. The statements of Dr. Craig, secretary of the A. M. A., and of several state secretaries whom he met in Chicago last October, have convinced your secretary that this estimate was correct.

However, when a two-day meeting of state secretaries was schednled, with no conflicting attractions, your secretary realized that he had the opportunity of his official lifetime and promptly went to Chicago.

There were in attendance more than seventy-five per cent. of the total possibilities, the conference spent a day and a half debating a series of questions propounded by a committee of the House of Delegates of the A. M. A., and the following resolutions were adopted:

"1. We recommend that this conference endorse the plan of having the fiscal year coincide with the calendar year in all parts of the organization. We further recommend that secretaries of all state associations which have not already adopted this provision bring this matter to the attention of their associations and recommend its adoption.

2. We recommend that constituent state associations adopt provisions making dues in county societies payable on January 1st. of each year, and requiring county secretaries to report to state secretaries all members in good standing, together with their per capita assessment for the current year not later than March 31st. State societies desiring to do so may provide a shorter period.

3. The recommendation regarding the third question under discussion is covered by our recommendation of the second.

4. Regarding the pro-rating of dues, we recommend that this be made optional with each local society.

5. Regarding an admission fee for membership we recommend that this be made optional with local societies.

6. While the committee recognizes, as a general principle that a uniform system of blanks for county and state societies is desirable as soon as practicable, we recommend further consideration of this question at a later conference.

7. We recommend that the House of Delegates of the American Medical Association be asked to consider the advisability of issuing charters to constituent state associations.

8. We recognize the desirability and advantage of uniform methods of transfer, but this system cannot be established until there has been developed a greater uniformity in other details of organization. We there-

fore recommend that this question be made the subject of discussion at a future conference.

9. The committee recognizes the value of this conference to the state association secretaries, and to the purposes of organization. It therefore recommends that future conferences of this character be held."

Taking these recommendations seriatim, let us see what there is in them for us.

Nos. 1, 2 and 3 are already in force with us.

No. 4 recommends leaving the matter to the individual society. I do not see how that can be done. We have no law on the subject in Mississippi. Dues have never been pro-rated with us. Since your present secretary has ben in office, no one has ever asked that his dues be pro-rated. Of course the matter of county dues can and should be left to the local society, but I take it that simply letting the matter stand as it is without action will continue to give satisfactory results.

No. 5 leaves the matter of admission fees with the county societies, to whom it properly belongs. That is customary with us.

No. 6, regarding uniform stationery in the offices of the different state secretaries, is a matter of no moment and there was no recommendation, but a request for further consideration. Judging from the samples of red tape exhibited by some of the state secretaries it would appear advisable to resist anything of the sort. Our methods are simple and at the same time pretty effective. They give us complete records and that is all we need worry about. When anything simpler is found, let's adopt it, but by all means let us have our business arrangements as simple and free from red tape as possible.

No. 7 refers the matter of chartering the state associations by the A. M. A. to the House of Delegates of that body. Since the acceptance of our delegates by the A. M. A. constitutes a virtual chartering, there seems no need for further, formal, action. It only means more red tape. It might be well to give our delegates to the A. M. A. an expression of opinion.

No. 8, regarding the uniform transfer of members between states, was the most debated question before the conference, but as soon as the possibilities of the situation were disclosed the northerns secretaries voted to abandon the idea. The matter is still open, however, and it would be wise for our delegates to the A. M. A. to keep in touch with the situation.

In addition to the above-mentioned official acts of the conference, there were other matters informally discussed that should be considered. Naturally a gathering of this sort offers many opportunities for information.

There is the matter of non-resident members. Should a man living in the jurisdiction of one association hold membership in another? Since this is a matter that presents many sides it has been made the subject of communication to the Council, with the request that suggestions be offered.

How to increase the membership was of course much discussed. Few county societies maintain an aggressive campaign for growth. Such matters are generally supposed to be the province of the county secretary and membership increases or diminishes in proportion to his ability, interest, state of health and the amount of time he can spare from his own affairs. We have some in this state who appear to be on the job all the time, but that is asking a good deal of them. Understand, they are not complaining and they are certainly delivering the goods, but for just this reason we should help them. The following plans are offered for your consideration:

1. Enforce Section 2, Chapter VIII of the by-laws.
2. Enforce Section 1, Chapter VII of the by-laws, and foot the bill.
3. Divide the state into three districts, elect one vice-president from each, give them powers and duties as organizers and pay their expenses.

In addition to these, there should be some plan of campaign mapped

out and submitted to each society. We should not be content with the natural unavoidable growth that time and the increase of the number of physicians in the state forces upon us, but endeavor to get every reputable physician within our jurisdiction to join us. We should work even harder this year, when our roll shows a greater number of paid up members today than ever before at the date of our annual meeting, than we have ever done in the past.

Dr. Simmons, the editor of the *Journal A. M. A.*, addressed the conference of state secretaries on the proposed change in plan of membership in that body. I can best give the information by using his graphic sketches and as there has been some misunderstanding on the subject I have them for you here on the blackboard.

Respectfully submitted,

E. F. HOWARD,
Secretary.

Exhibit A.—Finances 1912.
B.—Finances 1913.
C.—Communications.
D.—Deceased Members.
F.—Bills.

On motion of Councilor Dye, this report was approved as read.

Treasurer Sparkman then read his report:

TREASURER'S REPORT, MISSISSIPPI STATE MEDICAL ASSOCIATION,

1913 MEETING.

Cleveland Miss., April 5th, 1913.

At the 1912 meeting of this association we had a balance in the Treasury of $810.55 and on April 15th, following, I received from our secretary, Dr. E. F. Howard, a check for twenty-six hundred dollars ($2600.00), on April 18th, one for ninety-nine dollars ($99.00), on July 6th, one for one hundred and twenty dollars ($120.00) and on the same date a forfeit of one hundred dollars ($100.00) from the Mississippi Printing Company, and on December 18th, Dr. Howard sent in the last of the dues, amounting to thirty-four dollars and a half ($34.50), making a total of thirty-seven hundred and sixty-four and one-half dollars ($3764.05). The Medico Legal Fund, amounting to nine hundred and forty-eight dollars is included in the above amounts, but as the By-Laws of 1911 provide that this fund can be drawn out of the treasury only by a written order signed by the chairman and countersigned by the secretary of the Council, I have separated these two funds, and you will find the account of this fund on my ledger at page twenty-nine (29), none of which has been drawn out up to the present time.

The total disbursements to date are nineteen hundred and fifty-eight dollars and sixty-eight cents. The numbers of the vouchers for these amounts will be found on the left margin of page twenty-eight of the ledger, with the amount of each voucher on same page on the right margin. This leave a balance in the treasury of eight hundred and fifty seven dollars and thirty-seven cents, and of nine hundred and forty-eight dollars (948.00) in the Medico Legal Fund. Some of these vouchers were sent to the Cleveland State Bank for collection, hence I had to issue treasurer's check to cover same as the funds are kept in the Cotton Exchange Bank of Cleveland, Mississippi.

The balance in both funds amounts to eighteen hundred and five dol-

lars and thirty-seven cents ($1805.37), which is shown by the pass-book of the Treasurer on the Cotton Exchange Bank and which I submit for inspection, together with my ledger and al drafts drawn on me by our secretary, Dr. E. F. Howard.

Respectfully submitted,

L. B. SPARKMAN,

Treasurer Mississippi State Medical Association.

This report was referred to an auditing committee composed of Brooks of Coahoma, Brady of Monroe and Lucas of Sunflower, which committee was also requested by the secretary to investigate the financial exhibits of his report.

The president then read a communication from the Louisiana State Medical Society inviting the members of the Mississippi State Medical Association to participate in its 1913 meeting at Baton Rouge and on motion of ExPresident Curry the secretary was instructed to reply in fitting terms.

The president read a communication from the Secretary of the Interior regarding the Hot Springs Reservation, which, on motion of Ex-President Curry was referred to a committee of which Dr. Sutherland was to be chairman. The president appointed as the other members of this committee Dicks of Adams and Ex-President Curry.

Councilor Dye demanded roll-call, which showed the following in attendance:

Dicks of Adams, Borroum of Alcorn, Cumings of Amite, Austin of Bolivar, Arnold of Choctaw, Acker of Claiborne, Brooks of Coahoma, Little of Copiah, Emerson of DeSoto, Brown of Grenada, Hood of Harrison, Stingley of Hinds, Scudder of Issaquena, Rees of Lamar, Reynolds of Lauderdale, Dulaney of Leflore, McLeod of Lincoln, Jiggetts of Madison, Grady of Monroe, Arledge of Pearl River, Walley of Perry, Henderson of Quitman, Shotts of Rankin, Hall of Sharkey, Lucas of Sunflower, Backstrom of Tallahatchie, Johnson of Tunica, Myers of Warren, Treasurer Sparkman, Councilors Bullitt, Eason, Dye, Underwood, Ullman; Ex-Presidents Williams, Jones and Curry and Dr. Sutherland.

The nominating committee was chosen as follows: 1st. District, H. G. Johnson; 2nd., A. L. Emerson; 3rd., W. D. Arnold; 4th., W. J. Grady; 5th., J. R. Jiggitts; 6th., G. W. Acker; 7th., W. W. Reynolds*; 8th., H. Boswell; 9th., W. L. Little; 10th., W. I. Arledge.

On motion of Councilor Dye the chair was authorized to appoint the time for the first meeting of this committee which was set for the adjournment of the House of Delegates.

*Later replaced by R. H. Foster.

An amendment to the By-Laws, Chapter V, Section 1, to read "8 P. M." instead of "2 P. M." was introduced by Ex-President Curry.

The Constitutional amendment offered by Councilor Bullitt at the last meeting of the Association was called up by Councilor Dye. At Ex-President Curry's request Councilor Bullitt explained the amendment. Motion of Ex-President Jones to adopt the amendment was lost.

The House then adjourned and reconvened at 8:30 A. M. Wednesday, April 9th.

Roll-call showed the following changes in the personnel of the House:

Johnson replaced McLeod of Lincoln and Stephenson replaced Henderson of Quitman.

The following additions were made: Smith of Attala, Wilson of Chickasaw, Ringold of Carroll, Irby of Clark, Brown of Clay, Stevens of Forrest, Shepherd of Holmes, Rape of Jackson, Burnham of Jasper, Towns of Jefferson, Blount of Jefferson Davis, Kittrell of Jones, Conn of Lawrence, Parks of Leake, Gurney of Lee, Johnson of Marshall, Caruthers of Montgomery, Rush of Neshoba, Hagan of Newton, Noel of Oktibbeha, Robinson of Simpson, Willson of Washington, Marshall of Webster, Catchings of Wilkinson, Sanders of Yalobusha, Councilors Coker and Garrison, Ex-President Gray.

The auditing committee reported:

We, your committee appointed to audit the books of the secretary and treasurer, beg leave to report as follows: we find the books and accounts of these officers correct as shown in their reports and we recommend the payment of the accounts on list attached.

Respectfully submitted,
J. W. LUCAS.
J. S. BROOKS.
W. J. GRADY.

Ex-President Curry's amendment to the By-Laws was called up and passed.

Councilor Dye and Ex-President Gray offered the following constitutional amendment:

Amend Article IV, Section 5 by adding the words: "Each county shall be permitted to carry through its local society on the roll of the state association, free of all dues, the names of such physicians who, by reason of their advanced age and previous services to organized medicine are deemed worthy to be thus specially honored.

The House then adjourned and reconvened at 12:50 A. M. April 10th.

Roll-call showed fifty-eight votes in the House as follows: Sessions of Adams, replacing Dicks; Kendrick of Alcorn, replacing Borroum; Smith of Attala; Austin of Bolivar; Arnold of Choctaw; Acker of Claiborne; Irby of Clarke; Longino of Coahoma, replacing Brooks; Little of Copiah; Ramsay of Covington; Emerson of DeSoto; Stevens of Forrest; Hood of Harrison; Scudder of Issaquena; Rape of Jackson; Burnham of Jasper; McNair of Jefferson, replacing Towns; Blount of Jefferson Davis; Kittrell of Jones; McLean of Kemper; Linder of Lafayette; Rees of Lamar; Foster of Lauderdale; Conn of Lawrence; Gurney of Lee; Dulaney of Leflore; Johnson of Lincoln; Woodward of Marion; Johnson of Marshall; Grady of Monroe; Arledge of Pearl River; Walley of Perry; Boyd of Pike; Henderson of Quitman, replacing Stevenson; Haralson of Scott; Stewart of Sharkey; Lucas of Sunflower; Backstrom of Tallahatchie; Wilson of Tate; Boswell of Union; Myers of Warren; Willson of Washington; Marshall of Webster; Catchings of Wilkinson; Sanders of Yalobusha; McCalip of Yazoo; Councilors Bullitt, Eason, Dye, Underwood, Coker, Johnston, Garrison, Ullman; Ex-Presidents Williams, Jones, Gray; President Glass.

Councilor Dye read the report of the Council:

REPORT OF COUNCIL.

Vicksburg, Miss., April 10th, 1913.

To The House Of Delegates:—

Gentlemen: The Council met at 8 P. M. April 7th, 1913, with the following present: Bullitt, Ullman, Eason, Underwood, Majure, Garrison, Dye.

The State Secretary was authorized to issue charters to Leake and Kemper Counties when properly applied for.

The State Secretary was instructed to make formal request of the Hinds-Rankin Society for its application for charter as authorized in 1912.

The report of the executive committee, as appended, was read and accepted.

The Council met at 4 P. M. April 8th, with the following present: Bullitt, Ullman, Johnston, Underwood, Garrison, Eason, Majure, Dye.

The State Secretary was instructed to advise the Tennessee State Board of Health that Dr. F. G. Meriweather, Memphis, formerly of Lake Cormorant, Miss., was in good standing in the DeSoto County Medical Society in 1911, but failed to pay his dues for 1912 because of his intention of joining the Clarksdale and Six Counties Medical Society. Because of postgraduate work he failed to do this, but removed to Memphis in the fall of 1912. He is regular in every way except his lapse in dues for 1912 and 1913.

In reply to a query from the State Secretary the Council advises that the State Secretary cannot accept back dues from a member later than December the thirty-first of the year for which the dues are offered.

The Council received a communication from the State Secretary asking for the status of non-resident members. The Council advises that in case

a member moves from this state his membership continues until the end of the fiscal year during which such removal occurs. In regard to other conditions of non-resident membership, the matter involves so many intricate ramifications that the council defers rendering an opinion until presented with specific cases.

An application from Drs. R. E. Howard and R. C. Elmore of Holmes County, asking for reimbursement for legal expenses incurred in defending a suit against them, was received. The secretary of the Council was instructed to notify Drs. Howard and Elmore that their cases cannot be assumed by the Association for the following reasons: 1st. That the acts because of which their suits were brought occurred prior to the commencement of the operation of the defense laws. See *Transactions* 1912, page 17, line 6 and following. 2nd. Their application is not in accord with Chapter XIV, Sec. 5 of our By-Laws, inasmuch as they did not request the Association to defend their suit, but are requesting reimbursement for their expenses after undertaking their own defense.

The Chairman of the Council was authorized to arrange bond for the Treaurer.

J. B. BULLITT,
Chairman.

T. M. DYE,
Secretary.

The Executive Committee of the Council met in Jackson on November 28th. 1912; by invitation, the Secretary of the State Medical Association was present.

The Secretary of the State Association was instructed to advise the various local secretaries that it was imperative that county and state dues be collected early, by January the first, if possible, and that their reports with remittances should be in the office of the State Secretary not later than February the first.

The question as to the status of local societies which keep up their membership and dues only for alternate years was brought up and thoroughly thrashed out. The State Secretary was advised that when a society lapsed it surrendered its charter, and that it was necessary to apply for a new charter or to pay its dues for the preceding year. These appear to the committee to be the only alternatives open to such delinquent societies. A reference of this matter will be made to the Council for ratification at its April meeting.

Present at this meeting: J. B. Bullitt, J. S. Ullman, T. M. Dye, Committee; E. F. Howard, State Secretary.

T. M. DYE,
Secretary.

J. B. BULLITT,
Chairman.

Little of Copiah presented the report of the nominating committee:

For president: L. C. Feemster, W. L. Little, J. R. Kittrell.
For vice-president: R. M. Boyd, H. F. Sproles, J. J. Wilson.
For secretary: D. W. Jones.
For treasurer: J. M. Buchanan.
For councillor 9th. District: N. A. McLeod.
For councillor 10th. District: S. E. Rees.
For delegate A. M. A.: S. W. Blass.

Dr. Sutherland nominated E. F. Howard for secretary and was declared out of order.

A motion of Councilor Dye to receive the committee's report and go into election prevailed.

Drs. Little and Kittrell withdrew their names and on motion of Councilor Dye the secretary cast the vote of the House for Dr. Feemster for president.

On motion from the same source the secretary cast the vote of the House for the nominees for vice-president.

Dr. Sutherland then re-entered his nomination which was seconded by Haralson of Scott, Kendrick of Alcorn and Little of Copiah speaking on the nomination. Dr. Jones withdrew his name and moved that the chair cast the vote of the House for Dr. Howard for secretary, Little of Copiah seconding. Motion prevailed.

On motion of Councilor Johnston, the secretary cast the vote of the House for the nominees for councilors and delegate.. On motion of Little of Copiah, Dr. J. T. Boyd was chosen alternate to Dr. Glass, as delegate to the A. M. A.

Stevens of Forrest introduced the following resolution:

Whereas it is necessary for the conservation of the public health of this state to have a complete report of all cases of diseases which are communicable,

Therefore be it resolved that we, the members of the State Medical Association, do hereby recommend to the State Board of Health that some provision be made for the collection of such data.

Foster of Lauderdale put Meridian in nomination for the next place of meeting and Ex-President Curry nominated Columbus. The secretary read several telegrams from business organizations, medical societies and officials of both places. Columbus was chosen.

Councilor Dye entered a motion that the Association pay the expenses of one delegate to the A. M. A. Amended by Secretary Howard to pay the expenses of both. Councilor Dye accepted the amendment and the motion passed without a dissenting vote.

Councilor Ullman offered the following resolution which was passed by a rising vote:

Resolved that the Mississippi State Medical Association expresses its sincerest appreciation of the cordial welcome and bountiful hospitality of the Warren County Medical Society, the City of Vicksburg, the Elks' Club, the citizens of Vicksburg and Dr. S. Myers.

The House then adjourned.

E. F. HOWARD,
Secretary.

S. W. GLASS,
President.

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A PLEA FOR THE FEEBLE MINDED CHILDREN.

J. H. FOX M.D.,

ASYLUM.

The general condition of mental enfeeblement is called amentia, or mental deficiency; the terms, iodicy, imbecility and feeble-mindedness are used to distinguish the three grades of amentia.

Amentia, or mental deficiency, may be defined as "a state of mental defect from birth, or from an early age, due to incomplete cerebral development, in consequence of which the person affected is unable to perform his duties as a member of society, in the position of life to which he is born."

An idiot is "one so deeply defective in mind from birth, or from an early age, that he is unable to guard himself from common physical danger."

An imbecile is "one who by reason of mental defect existing from birth or from an early age, is incapable of earning his own living, but is capable of guarding himself against common physical dangers."

A feeble-minded person is "one who is capable of earning his living under favorable circumstances, but is incapable, from mental defect existing from birth or from an early age, of competing on equal terms with his normal fellows; or of managing himself or his affairs with ordinary prudence."

We learn from the statistics of 1910 that in our southland alone we have more than sixty-eight thousand feeble-minded persons.

This number may seem exaggerated to you, but when we examine our orphan asylums, alms houses, jails, reformatories, houses of prostitution and penetentiaries, to say nothing of those who are allowed to roam at will, we can readily see that we have a large army of human misfits.

The average citizen has little knowledge of the number of

feeble-minded persons at large nor of the attendant dangers upon their unrestrained presence.

Feeble-hindedness produces more pauperism, degeneracy and crime than any other one force, and those who have studied this subject realize that the feeble-minded are a menace to our present-day civilization, and that there is a crying need for some concerted action looking toward the control of the situation. I do not intend to go into the causes of feeble-mindedness in this paper they are too well-known. Profound thinkers have said that most of the human misfits are born and comparatively few are made. My purpose is to call your attention to the horrors attendant upon feeble-mindedness and to suggest remedial measures. The problem is a vast one and we will have many obstacles to overcome, but it is high time that we physicians, guardians of the public health, should sit down quietly and unafraid and discuss this all-important subject. This subject has passed the problematic stage, we do not need investigation or research, they have been made and recorded. Our work should be along the lines of arousing the public to a full understanding of the situation and bringing the attention of the legislature to the need of enacting common-sense laws to check the steady increase of the defectives and to make provision for their segregation and custody.

Feeble-mindedness plays a prominent part in the demand and drain upon charitable associations and private relief. Frequently we find that a demand for assistance can be traced to a condition that has been brought about by a dependent degenerate, and just as frequently this aid that has been rendered in good faith will not be of any permanent benefit because the individual under the existing circumstances will have to be aided again and again.

Feeble-minded women should be segregated until they are past the child-bearing age for more than one reason. Because of their mental enfeeblement they are the sources of ruin that blight the life of many of our youths. We learn from statistics that one-third of the inmates of the houses of prostitution in Chicago are feeble-minded. They not only disseminate disease but they bring into the world many children who follow in their mothers' footsteps. Out in the world, allowed to roam at will, feeble-minded women are subjected to many temptations which as a rule result in sexual immorality. Strange to say, but it is true, that feeble-minded women are very productive and although the mortality of these children is very great,

large numbers of them survive to become a burden upon the public. So it is very plain that a great deal could be saved for the State if these women were placed in an institution for the purpose at the proper age. It is estimated that the institution at Newark, N. Y. (capacity 795) has saved the State the birth of at least five thousand defective children. There is no doubt that feeble-mindedness is directly inherited and some steps should be taken to prevent the multiplication of the unfit. The union of two stocks, when in either or in both there is insanity or feeble-mindedness, usually results in some or in all of the offspring being in some way defective. Dr. Johnstone of the Vineland Training School, N. J., says that "when both parents are feeble-minded, all the children are always feeble-minded; and alcohol, syphilis, tuberculosis and illegitimacy are found in every one of the degenerate families."

In the home the presence of a feeble-minded child causes much shame, anxiety and grief to the parents and as he grows older he becomes a burden that is hard to bear. Such a child requires the services of some person continuously and thereby deprives society of maybe an useful member. The expense of the care of this child frequently depletes the earnings of the family to such an extent that the family may become a charge for charity. Often we find that normal children are pressed into service to care for a defective child and the result is that the health and education of the normal child is interfered with. Again the mother may have such a maternal tenderness for the weak one that she may overtax her strength and become a weakling herself to say nothing of the neglect the normal children may be obliged to receive. This burden should be lifted from the family by the state taking charge of the defective child so that the mother can exert her energies toward the care of the normal children. We also find that some unfeeling people regard a feeble-minded child as an asset, his weakness is used as a means for obtaining charitable assistance in some cases, and in others he is put to work to aid in increasing the family income. The result of this is he is frequently treated cruelly or neglected.

A common crime among mental defectives is that of arson. In the larger cities great conflagrations, that have destroyed thousands upon thousands of dollars' worth of property and caused the death of hundreds and hundreds of human beings, have been directly traced to the act of some feeble-minded person. The excitement attendant upon a fire pleases them, they set fire to a building simply for the pleasure of seeing the de-

partment turn out and to watch the flames. Just think of the expense and misery caused by the wanton act of a feeble mind and how all this could have been prevented if that pyromaniac had been placed and cared for in an institution at the proper time.

Our public schools do not discriminate against sub-normal children and as a consequence they seriously interefer with the and of their normal fellows, because the cliss will often be held back on account of a sluggard in its ranks. On the other hand a feeble-minded child cannot be given the proper training in the regular grades, what he needs is a special form of training that is not found in the public schools, and this training should be continued after they have passed the school age limit of sixteen. Another point is that such individuals will require special supervision because they are incapable of earning their living and developing their own powers and restraining their impulses.

The result is this: the burden of their criminality, immorality and increase of their kind are effectively prevented.

Do I hear you say, what is the remedy? It is plainly this: the state must have a school or institution for all of the unfortunate. They should be trained, taught, employed and controlled. There is in the United States about thirty of these institutions, but in the south we have only five. Maryland, Virginia, North Carolina, Kentucky and Texas. We need one in our grand old state.

Mr. Alexander Johnson, formerly superintendent of the Indiana School for Feeble-Minded Youths, an eminent authority on this subject, has said: "With regard to the management —the first essential is happiness. Make them happy and you can do almost anything with them. Fail in this and your failure is total. They are very easily pleased. Most of them are cheerful, affectionate and fickle beings. They are children always. The mother state must take them into her good motherly arms and care for them. They are the weak. You who are strong must bear the burdens of the weak."

Feeble-minded children should be taken when they are young and trained and educated so that they may be able to use this knowledge when they become men and women in years.

I do not wish to leave the impression with you that all of the defectives can be educated, no there are many that nothing can be done for except custodial care and by that means relieve the family burden. But it is a mistaken idea that because

of a mental defect there is no hope for the individual. Reports from the various schools for this class, prove beyond all doubt that many hopeless cases have been made self-supporting factors in the social fabric, rather than threads so rotten through ignorance and vice that they endanger the strength and social purity of the life of the nation.

The state provides for the blind and it is right that it should do so, but there is no provision made for the child that has eyes, yet sees not, likewise provision is made for the deaf and dumb, yet who care for the afflicted one whose ears are useless because he knows not the meaning of sounds and whose tongue cannot convey his thoughts and desires because of a lack of co-ordination of mind and muscles.

If the state will even at this late day take hold of the matter and insist on the segregation of all feeble-minded persons under state supervision and care, society will be safeguarded and the future will see a marked diminution in the numbers of feeble-minded.

In an institution such as I have referred to, the whole life of the child is under constant supervision. The routine life he leads makes him a creature of habit, he begins the day with instruction as to when he mustarise, he is instructed what clothing to put on, when to eat, what to eat, and on through the day his duties, conduct and pleasures are planned and controlled by competent instructors. A well-regulated institution has its school, work shop, domestic department, farm and amusements which all assist in making a self-supporting, healthy and happy individual out of what was once a poor unfortunate weakling.

The main impulse that prompted me to make this appeal to you has been my observations of the feeble-minded children who are now confined in our State Insane Hospitals. On account of unfortunate circumstances, such as loss of parents or other calamities, frequently some of these children have to be confined in our asylums. It is enough to make one's heart bleed to see these poor unfortunates growing up amid such surroundings. There is little or no good they can learn with such associates, but on the other hand there is much evil that their simple minds readily grasp.

I hope you gentlemen will ponder over this question and will lend your aid and influence toward the establishment of an institution which will be a home and school for the thousands of feeble-minded children in Mississippi.

No words from pen of mine can express so forcibly or

beautifully the conditions of these unfortunates groping in the half-light, and their need for recognition and relief, as those lines from the pen of Mary Butler Kirkbridge called the Army of Sorrow:

Men of victorious cities, aglow with the heat of the strife,
Men of the bountiful country, alert, and throbbing with life,
Fathers of bright-eyed daughters, mothers of stalwart sons,
Hark to the host of the vanquished, marching with lowered guns.
For we are the Army of Sorrow, living, yet worse than dead,
Saddest of all God's creatures, from whom His light has fled.
The guilt of the mighty cities has doubled our teeming ranks,
But many a sun-lit valley sends stragglers at our flanks.
From village and town and prairie o'er the length and breadth of our land
Are gathered the thousands on thousands, who make up our pitiful band.
O God, can ye leave us longer, us who are guiltless of sin,
Or rest for a single moment till each lost sheep is within!
Gray-haired, yet catching at sunbeams; of age, yet playing with toys;
You house us with tramps and drunkards, grown men and man-grown boys,
Lured by each wayward impulse, bereft of the power of control,
Yet placed in a world of demons ready to snatch at our soul.
O Sisters, think of us women, children in innocence,
Yet mothers of fatherless babies, victims of foul offense.
Oh, the pangs that we must suffer, the anguish at their birth,
Hunted and mocked, and branded the outcasts of the earth.
Saved only the bitter knowledge that by an iron law
Our children, and their children, must carry the self-same flaw.
O Brothers who hold the purse strings in each of the kindred states,
Who vote vast sums for highways, and decking of the gates,
If you laid the wealth of the nation in payment at our feet,
The debt to our lost manhood you still would fail to meet;
Yet now but a handful of us are guarded with zealous care,
While the rest, like a festering ulcer, on our country's breast lie bare.
If love and fleet-foot pity knock vainly at your door,
Shall fear and worldly-wisdom not spur you on the more?
We ask for broad, green farm-lands, the sunshine that we love,
With stillness brooding o'er us like the wings of a nesting dove:
To taste the joys of labor on the lap of the kindly earth
And to prove, though maimed and halting, our lives may yet have worth.
We pray that each low ember you gently, wisely fan,
Till each of reach his measure of likeness to a man.
Your reward? May it not be the vision that in our wrecked bodies of clay
A Christ-child was growing in wisdom and stature from day unto day?

ACCIDENT NEUROSIS; WITH REPORT OF CASE.

G. S. BRYAN M.D.,

AMORY.

Mr. President and Fellow Members of Mississippi Medical Association:

It is with much trepidation that I come before this body with a subject so deserving of research and careful prepara-

tion. However, it is not my purpose to go into all phases of the subject. The time allotted will not permit this, besides the general subject of psychoneurosis is too large and intricate for anyone not an expert neurologist to undertake. I will simply say that this condition commonly known as hysteria is a distinct entity—a disease if you will, though essentially psychical, and its victims are peculiar in their nature and mental constitution. However, hysteria is no evidence of lack of intellectual acumen or of culture and refinement. Neither does it indicate intellectuality or mental training. For these cases are met within all stations of life and among all shades of mentality. However, there seems to be this much in common between them all: they are possessed of what might be called lack of "nervous stability." They are, almost without exception, irritable and emotional. They are sensitive to extremes and whimsical beyond measure. Their hatred is easily engendered—though in most cases, this can be appeased. In many cases it seems to be consumed of its own fires. A prominent feature of their personality is the exaggerated ego. This is made manifest in their inevitable and universal exaggeration of their symptoms and sufferings. They have an inordinate craving for sympathy. They languish without it and revel in it when extended. While they are, in the main, lacking in willpower and force of character, they can be both obstinate and cunning in their purposes. For the attaining of selfish and personal ends, they can be most amiable, attractive and seductive. Of course these manifestations are not equally prominent in all cases. In fact some experience and very close scrutiny is necessary to be sure you are dealing with this condition in many cases. For occasionally either partial or complete loss of either motion or sensation—sometimes both—or severe contracture may be present without noticeable mental peculiarities. In such cases an intimate acquaintance with the patient and a full knowledge of past history are very essential to a correct interpretation of the symptom complex. In many cases the nutrition is in no way disturbed, while in others it is markedly so by reason of the consequent disturbance of digestion, appetite and the capacity for sleep.

Of course I have only touched lightly on the characteristic stigmata of this grave and frequent condition, but sufficiently, I think, to introduce the particular phase of this trouble set out in my title as "Accident Neurosis." I believe there are many, many people that are so unfortunate as to have the condition referred to above as "nervous instability" as a birth-

right and only need some accident or trauma (either real or fancied) to set up the pathology I have seen fit to call accident neurosis. You will please note that I say some trauma is only needed to set up the pathology. After it is once set up there are many causes for its continuance. The simple fact that more or less public or outside interest and attention may be excited, so appeals to the exaggerated ego already referred to, not only keeps the condition going, but in some cases causes it to grow worse from time to time. Again the fear that the ability to successfully fight the battles of life may be lost is good and sufficient grounds for failure to recover. In the case of a female the dread of loss of social prestige by reason of her infirmity or the fear that husband or children may tire of her and regard her as a burden may be a factor in the perpetuation of the malady. I have seen such cases. But of late years, I think the hope of pecuniary gain coupled with the suggestions from attorneys and attending physicians, plays a most important role. My personal experience, covering a period of something like twenty years' employment as division surgeon for one of the large railway systems, confirms me in this belief. During this time I have cared for the injured of all classes—ranging from the negro section laborer to superintendent—from the lowest class tramp to bank president—and I might say to the superannuated minister of the gospel—for Jew and Gentile. And in the language of the Apostle Paul: "there is no difference." There is no surgeon of large experience but has seen the most distressing symptoms follow the most trivial injury. And it is easy to recall cases where prompt improvement and complete recovery have followed immediately after settlement of a claim for damages or insurance. But the sad feature of the case is we cometimes meet with cases that do not improve but on the other hand remain permanently disabled or go from bad to worse until death closes the scene, even though the trouble be strictly psychopathic.

Some time between the 1st. and 10th. of October 1912 a well-developed, well-preserved man, about forty or forty-five years old, is supposed to have been drawing a cup of water from the cooler on a passenger coach while the train was standing still at a station. While the engine was being coupled on to the train the man says he staggered back against the nearest seat, striking his right lumbar region against the arm of a seat. He does not claim that much pain was felt from the impact. He rode the train fourteen miles, got off without inconvenience and rode in a wagon or buggy eight or ten miles into the

country to his home. I do not know what day he first consulted a doctor but on the 11th. of October he reported to a doctor that his head pained continuously—that his legs were numb—that the right one was more so than the left. The doctor reports that there was at that time some evidence that the lumbar muscles had been slightly bruised. On the 11th. of October I was asked by the attending physician to see the man. At that time he seemed to have some trouble in walking and claimed that sensation was not perfect in legs—less so in right leg than left. He complained of pain in head and said he had some tronble in emptying bowels and bladder. He was seen again on the 21st. of October by his doctor and the doctor reported that sensation was not so good as on the 18th., the man claiming he could not feel pin-prick in lower extremities. Neither did he seem to have as good use of legs as when seen last. On the 30th. of October his doctor reported "patient progressively growing worse. Can scarcely walk at all and cannot step over anything with left foot. Cannot stand erect with eyes closed. Loss of sensation complete or nearly so. Constant headache." On the 11th. of November doctor reports that condition of right leg is some better but left grows steadily worse. At this point I lose sight of the case and its progress. I only know that negotiations were being carried on between the representative of the railroad and an attorney for injured man looking for a settlement of a personal injury claim.

On the 5th. of March 1913 I saw the man while he was being subjected to a very close, carefnl and painstaking examination by a doctor who lives in an adjoining state—one who enjoys a wide and enviable reputation as an alienist and neurologist. I append hereto a written report of his findings and conclusions:

"March 5th. 1913.

"This man was first observed by me walking on the street at Amory, Miss., at a distance of, approximately, two hundred yards. He did not know that he was being observed. He supported himself upon crutches and apparently moved with some difficulty, supporting himself mainly upon the right foot, swinging the left foot and leg somewhat laboriously but touching the left toes to the ground as he progressed. The foot was considerably everted, the knees considerably flexed, and the leg slightly flexed at the hip joint.

"Later the man arrived at the office of Dr. ..... in an automobile; and in alighting from the vehicle exhibited

about the same amount and character of disability of movement as described above.

"History: the patient claims to have been thrown against the end of a car seat by a jolt incidental to the coupling on of an engine. That at first he experienced very little pain; but as time passed the pain at the site of the impact became more and more pronounced, so that by the end of that same day, upon arriving at his home, he had to be assisted from his buggy or wagon. That, subsequently, as time passed, he lost the power of feeling in his legs and there occurred a growing loss of power in them until he arrived at the condition in which now is. He claims, however, that in the earlier period of his disability it was his right leg which was most affected, and that as time passed the right leg got better while the left one got worse. At the present moment, he claims to have almost no use of the left leg.

"Physical Examination: patient appears to be some forty-five years old. Approximately about five feet ten inches in height and would weigh, I should think, about one hundred and forty to one hundred and fifty pounds. This disability consists of inco-ordination rather than paralysis.

"Stripped: There is no atrophy nor contraction of muscles and the surface temperature appears to be the same over feet and legs as over hands and arms. The muscles are not flabby and appear to be well nourished. The muscles appear to be, to some extent, in a state of spastic rigidity. That is to say, when a joint is bent, the resistance can be felt and the limb, when the force is relaxed, slowly returns to its original position. Upon being asked to move the left foot and toes, the patient appears to make fruitless efforts to do so. With the right foot the result is better, but the motion is poor.

"Reflexes: the patellar reflex on both sides is markedly increased and there is an ankle klonus on both sides. The cremasteric reflex is normal and so is the pupil. No abdominal reflex is observable.

"Sensation: from a line corresponding with the lower margin of the tenth rib no evidence of sensation is observable. I tried with tooth-pick, a handkerchief, pins, hot and cold water, and the strongest current my battery would produce; and no evidence of pain, tactile, temperature, or location sensibility could be elicited, from the line above indicated to the tips of the toes. Above this line he responded readily and accurately to every test of sensation. Special senses normal.

"Sphincters: there was no evidence of impairment of the

function of the sphincters, although the patient said that at first, the first few days, he had had trouble in passing water, and that he still has trouble getting the bowels to act.

"Motor Function: all responses to my efforts to get him to move feet and legs were unavailing on the left side. On the right, motion was evident, but weak. Upon the application of the faradic current all muscles of the legs and feet responded normally. And this, too, whether I had both poles of the battery on the leg only or one on one leg and the other on the other, or with one on the hand and the other on the foot. Indeed, it seemed to make no difference where I placed the poles of the battery, the muscular contractions corresponding to the nerve trunks involved in the passage of the current were instantaneous and vigorous.

"Inspection of the back revealed no evidence of injury to nor disease of the vertebræ. Nor could any tender spots along the spinal column be located. When I asked him to point to the site of the injury he pointed out the junction of the last lumbar vertebra with the sacrum.

"Heart and lungs appeared to be normal. I did not examine the urine nor take the arterial blood pressure as I did not see that there was any indication for doing so as far as the object of this examination was concerned.

Conclusion: to the best of judgment, this apparent paraplegia is due to an hysterical condition. I know of no lesion of the nervous system which should give the symptom picture here presented. The patient belongs to that stratum of society in which such hysterical manifestations are not infrequently met with, and the conditions surrounding the case are those which are generally found to be conducive to the development of such physical impressions. Of course, the patient could also be a malingerer, pure and simple, but against this would be the necessity of assuming a degree of coaching and education of a certain character which would appear to me to be improbable. I would not do the man an injustice; and, therefore, would say that I should want the opportunity to observe him frequently and under a variety of conditions and through a long period of time before I would be willing to express an opinion of that kind about him.

"I should consider a plaintiff of this kind to be a dangerous proposition for the defendant if brought before a jury in his present condition."

I trust that this poor paper together with the appended report of examination by a very capable neurologist will elicit

a discussion that may be helpful to some member present. My purpose and apology for presenting this subject for your consideration is that some one may be put on his guard so to speak and may escape the consequences that sometimes follow a failure to recognize this class of cases promptly.

CAESAREAN SECTION.

H. R. SHANDS M.D.,

JACKSON.

Since learning that this subject was to be treated in this section by two distinguished visitors, I have decided to restrict my remarks to a few personal observations and experiences in connection with Cæsarean section.

The wonderful advance that has been made in recent years in operative midwifery is not fully appreciated by the majority of our physicians. We cannot use our time more profitably than in thus considering in detail the modern means at our disposal to save unborn babies and to relieve suffering womankind in the pangs of an obstructed or otherwise abnormal labor.

The progress in this line of surgery has been great. Only eight years ago, during my two years in the Louisiana Charity Hospital, which has a large obstetrical service, no Cæsarean section was performed. I can now recall several cases in which the indication was absolute. While there I saw two women die of placenta previa and one of ruptured uterus, which was caused by a skilled house surgeon trying to do a podalic version. In my opinion these women could have been saved by Cæsarean section. Furthermore, I don't believe there was a deliberately planned and executed Cæsarean section in New Orleans during this time.

Now, almost every journal has in it a report of successful cases of Cæsarean section by men of certainly no greater skill than that possessed by the New Orleans surgeons eight years ago.

The indications and contra-indications have been so clearly worked out that the mortality in properly selected and treated cases has been brought to only four per cent. Mind you, this is a four-per-cent. mortality in markedly abnormal cases. Almost the only abnormality which contra-indicates this mode of treatment is infection. I dare say if most of us would foot up

our obstetrical experience we could not beat a four-per-cent. mortality when we considered both our normal and abnormal cases.

I have had the opportunity to deliver three women by the abdominal route. The first case was improperly treated before operation—result fatal. This case was seen in November 1911. The woman, otherwise healthy, came to full term labor with a contracted pelvis and transverse presentation. The attending physicians used their best endeavors to do a podalic version and failed. The woman for some reason became collapsed and I was summoned to do a Cæsarean section. She lived eleven miles from Jackson in an ordinary country home. When I first saw her she had been in labor over twenty-four hours, had unmistakable evidence of a ruptured uterus and was severly collapsed—pulse one hundred and fifty. We made a pre-operative diagnosis of ruptured uterus and dead baby. Our best judgment was that the rupture had occured about fourteen hours before operation. We took a forlorn chance and operated, removing the fœtus and the uterus. The patient died two days after operation, as cases thus treated before operation will practically always do.

The second case occurred in my own private practice in a highly nervous primipara of thirty-four. Two weeks before operation she had a small hemorrhage which caused me to suspect and detect placenta previa. In this case we were able to obey the rules that have been formulated for the treatment of cases in which it is suspected that a Cæsarean section will be necessary. She had another hemorrhage on the evening of October 30th, 1912. She was immediately taken to the hospital and a Cæsarean section performed. She was able to be removed home in an ambulance on November 3rd., four days after the operation. She had a perfectly normal afebrile puerperium and mother and baby are now in excelent health, with the mother nursing her baby at the breast.

We had operated upon this woman six years before this for an adnexal and appendiceal disease. During this pregnancy she had exhibited strong symptoms of gall-bladder disease. During the operation of Cæsarean section we took occasion to palpate her gall bladder and determine that she had no gall stones or other evidence of gall bladder disease.

The third case was admitted to the State Charity Hospital, at Jackson, in September 1912. She gave this obstetrical history. She was now thirty-four years old, having married when she was seventeen. Her first three labors were normal, the

fourth difficult, the fifth very difficult and instrumental. In the sixth labor the baby had to be killed to be removed. This was her seventh pregnancy. Upon examining her we found a large, solid tumor growing in the hollow of the sacrum behind the rectum and retro-peritoneal. After discussing the condition with her husband and herself, we advised her to go home and return to the hospital for a Cæsarean section when she was near full term. This she did and went into labor on the morning of March 12th. 1913. We did a classical Cæsarean section and delivered a living baby. Baby and mother both did well. The patient left the hospital on the 28th. of March well satisfied and in good health with the exception of the tumor. At the time of delivery the true conjugate diameter on account of the impingement of the tumor was only one inch. She expects to return to have the tumor removed later.

As to the elective time of Cæsarean section—for the sake of the baby the pregnancy should be allowed to as nearly approach full term as possible. For the mother's sake there are some theoretical advantages in waiting for the actual onset of labor pains. Practically, however, I do not believe this makes much difference.

For this operation the patient is prepared as for any other abdominal operation. The incision should be made high up, almost entirely above the umbilicus. This incision gives three or four advantages; first, you will be well out of the way of the bladder, which ascends surprisingly high in late pregnancy. Second, the incision in the uterus is made through the thick muscular fundus, and not through the greatly thinned-out lower segment. Third, there is not so much danger of the uterus becoming adherent to the abdominal incision. Fourth, in the usual head presentation the feet are somewhat more easily caught for delivery. An assistant should press his hands firmly on either side of the abdomen to bulge the uterus up against the abdominal wall and continue this until the fœtus is removed. The incision should be made only long enough to deliver the baby through. In clean cases I believe the uterus should never be delivered. When the uterine wall has been incised, if the membranes are still unruptured it is wise to pass the hand around and free the membranes before rupturing the bag of waters. If the placenta is in the way, push it aside or tear through it. Catch the baby's feet and deliver it feet first. Quickly clamp and cut the cord and turn the baby over to an assistant. Have an assistant hook his finger in the upper

end of the uterine incision and hold the uterus up until the placenta is delivered and the uterine sutures taken. For the reason that a continuous suture can be made more rapidly than an interrupted, I have adopted the plan of first making a continuous interlocking suture through the entire thickness and length of the uterine incision. This controls the hemorrhage from the uterine wall. Of course this suture does not penetrate the endometrium. Outside of this continuous suture I have put interrupted mattress sutures and finally a continuous fine suture for the peritoneum. Cat-gut throughout is the best suture material. The abdominal wall is closed as usnal.

In doing an operation this way it is surprising how little blood and amniotic fluid will escape into the abdomen.

Technically, the operation of Cæsarean section is easy, and most of the mortality comes not from imperfect operative technique, but from improper management of the cases before operation. Generally, it is the same old story of waiting too late before resorting to operative measures.

Whenever possible the obstetrician should examine his cases and measure his pelves before labor so that he can at least suspect that he is going to have a difficult time and plan accordingly.

The one absolute essential of success in abdominal delivery is that the woman shall not have been infected by frequent vaginal examinations, or fruitless attempts at delivery per vaginam.

Certainly the time has come when every obstetrician should use a boiled rubber glove when making a vaginal examination. If he tries he can get along with very much fewer vaginal examinations than are generally made.

I have not detailed the various indications and contra-indications of Cæsarean section and have not touched on the various pathological conditions associated with pregnancy for I am sure these points will be brought out by the other essayists.

Personal.

Dr. L. C. Feemster, the president of the Association, has moved from Nettleton to Tupelo.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

With the advent of the warm weather and its concomitant infantile gastro-intestinal disorders we are again beginning to meet our old friends the patent-medicine colic cures. Heaven only knows how many babies are usually "doped" out of this into a better world, but even the fact that they are being sent to a better place cannot be offered as an excuse for the route by which they are sent. It is probably up to the doctors to put this form of murder where it belongs—out of business—and the following clipping from the *Journal of the American Medical Association* indicates a way. It is respectfully referred to the State Board of Health, since the legislature meets in January:

"THE POISON LABEL—A NEEDED AMENDMENT.

"For the purpose of safeguarding the public against the dangers of poisons, Mr. French of Idaho has introduced into the House of Representatives a proposed amendment to the Federal Food and Drugs Act. The amendment which refers to the labels and containers of poisons declares that a drug shall be deemed misbranded:

> "'If the contents of the package be a virulent poison and shall not be placed in a container labeled 'Poison' and shall not contain on the label at least one suitable antidote and the name of the person, firm or corporation dispensing the substances, and in the case of liquids, in addition thereto, said container shall be a colored glass roughened bottle of a type described by Secretary of the Treasury, the Secretary of Agriculture and the Secretary of Commerce.'

"Idaho is to be congratulated on having a representative whose solicitude for the public safety may be the means of strengthening the Food and Drugs Act. In the past, it has been altogether too easy for careless or unscrupulous manufacturers to sell powerful drugs without giving the purchaser any hint as to the potency of the product he was buying. Another amendment should be made, or the proposed one modified, so as to protect the public still further. All 'patent medicines' containing poisonous drugs should be required to be labeled 'Poison.' The protective action of such an amendment would soon be demonstrated. In Great Britain, where there is such a legal requirement, preparations like Winslow's Soothing Syrup, containing such insidious poisons as morphine, have to be labeled 'Poison.' As a result the Winslow concern has taken the morphine out of its British product and has substituted a drug that is not listed in schedule of poisons. But Winslow's Soothing Syrup still goes to American babies with its deadly morphine. The value of the requirement lies in the fact that the word 'Poison' has a very real and definite meaning to any person that reads English. The same cannot be said of the chemical names for various poisons. Thus the most ignorant of mothers would hesitate to give her child a 'patent medicine' that was labeled 'Poison,' but she would pay little attention to the statement that it contained morphine, for instance. The weakness of the present federal law has been referred to many times. As the law now stands, 'patent medicines' may go to the public containing such deadly poisons as strychinine, atropin, prussic acid, arsenic, etc., with no warning or hint of the presence of these drugs."

Society Proceedings.

East Mississippi Four-County Medical Society met in Tupelo Tuesday, April 22nd, and discussed the following program: "Hydrothorax," F. A. Jones, Memphis, Tenn.; "Prostatic Hypertrophy," T. C. Holloway, Memphis, Tenn.; "Accident Neurosis With Report Of Case," G. S. Bryan, Amory; "Conservative Versus Radical Surgery Of The Ovaries," E. M. Holder, Memphis, Tenn.; "Some Obstetrical Observations With Case Reports," W. J. Grady, Amory; "Gastro-Enteric Intoxication," B. C. Tubb, Smithville. Following the meeting the

Tupelo physicians entertained the visitors at a banquet. Dr. L. C. Feemster serving as toastmaster and responses being made by Drs. G. S. Bryan, T. T. Bonner, F. A. Jones, W. J. Grady, E. M. Holder, T. C. Holloway, J. O. Gurney and F. J. Underwood. The society then adjourned to meet in Okolona, Tuesday May 20th.

F. J. UNDERWOOD.

Book Reviews.

A TEXT-BOOK OF OBSTETRICS by B. C. Hirst M.D., Prefessor of Obstetrics in the University of Pennsylvania, etc. Seventh edition, revised and enlarged, with 895 illustrations, 53 of them in colors. W. B. Saunders Co., Philadelphia. Price $5.00.

The reviewrr has had intimate acquaintance with three previous editions of Hirst's Obstetrics and his meeting with the seventh but confirms the belief that it is the best and most practical work on the subject that he has seen. The addition of the pages devoted to the pathological conditions resulting from labor which were the chief characteristics of the last revision, is adhered to in this and gives the general practitioner pretty much all the information needed to handle the cases he will be called upon to treat. The present edition also amplifies the article on diseases of the breast, an excellent plan since it is the accoucher who first meets them in the great majority of cases.

E. F. HOWARD.

MANUAL OF MEDICINE FOR NURSES. by George H. Hoxie M.D., Physician to the German Hospital, Kansas City, Mo., and Pearl L. Laptad, formerly Principal of the Training School for Nurses of the University of Kansas. Second edition, rewritten and enlarged. Philadelphia and London: W. B. Saunders Company, 1913. Cloth $1.50 net.

This little book is one of the most practical that the reviewer has seen. Beginning with a concise, sane discussion of the causation and cure of disease, the author devote three chapters to general considerations of nursing, such as care of the room, bed and patient, feeding, bathing, disinfection, therapeutic measures to be applied by the nurse, and a study of the means for determining the condition of patients, such as temperature, pulse, skin, excretions, etc., and then the various diseases and the points peculiar to each are fully described.

DISEASES OF THE STOMACH, INTESTINES AND PANCREAS. By Robert Coleman Kemp M.D., Professor of Gastro-Intestinal Diseases, New York School of Clinical Medicine. Second edition, revised and enlarged, with 388 illustrations. Philadelphia and London: W. B. Saunders Company, 1912. Cloth $6.50 net.

The second edition of this sterling work within two years speaks volumes for its great usefulness to the general practitioner, in fact, few text-books are so explicit and so clearly written as this one upon those hardest of all subjects, the stomach and intestines. Several new subjects have been added, as a discussion of the infection by the B. Coli Communis and pancreatic disease. The chapter on constipation is very full and leaves nothing unsaid that might aid in helping this most troublesome complaint.

We desire here to disagree with the author (F. 261) that the daily injection of two ounces olive oil or glycerine suppository will aid to cure the constipation. In all this work, we find but one serious objection, that is, the constant recommendation of the various proprietary medicines; for instance, iron tropon is constantly advised. In dysentery, mucol is advised, and three lines given to say "it contains the chloride, borate, bicarbonate and benzoate of soda, with zinc sulphocarbolate and essential oils." Why not write a prescription for those ingredients, then, if one knows what one wants and isn't paralyzed?

Under diarrhœa, the author advises tincture opium, tincture, catechu compound and aqua destill. Many patients would prefer diarrhœa to taking such an unsightly mess. The next edition ought to see a ruthless pruning of such unscientific prescribing and thus remove the only objection to the most complete and trustworthy text-book upon this subject that we know of.

S. MYERS.

THE OPERATING ROOM AND PATIENT—By Russell S. Fowler M.D., Chief Surgeon First Division, German Hospital, Brooklyn, New York. Third edition rewritten and enlarged. Octavo volume of 611 pages with 212 illustrations. Philadelphia and London: W. B. Saunders Company, 1913. Cloth, $3.50 net.

An excellent ork and filled with good suggestions and advice to physicians who own or manage private or public hospitals. Every possible complication that could arise following an operation is gone into in detail and latest treatments given, and where necessary the text is well illustrated. The chapter on bandaging is the most complete I have ever seen and the illustrations are plain and graphic. For the average private institution and small hospital there are more assistants and nurses used in operations than are necessary and the method of giving anesthetics probably differs from that being used by most operators, yet withal the book is exceptionally free from fault. It's a mighty good book to have in your library and certainly should be read by every physician or surgeon who owns an institution or manages one.

S. W. JOHNSTON.

THE PRACTICE OF GYNECOLOGY. By W. Easterly Ashton M.D., LL.D., Professor of Gynecology in the Medico-Chirurgal College of Philadelphia. Fifth edition, thoroughly revised. Octavo of 1100 pages, with 1050 original line drawings. Philadelphia and London: W. B. Saunders Company, 1912. Cloth, $6.50 net; half morocco, $8.00 net.

Ashton's new work is certainly a credit to the author and editor and deserves to be in the hands of every practitioner of medicine and is really indispensable to any man doing operative work. The book contains more than a thousand clear-cut and graphic illustrations and eleven hundred pages of genuine gynecology. Ashton never overlooks the fact that the reader or student is not as thoroughly familiar with the condition and treatment he is describing as himself and consequently every chapter in his book is so plainly written that any man can understand perfectly what he is reading. The technic of the operations is so thoroughly gone into and so simply stated, that taken together with his excellent illustrations, gives the reader as much knowledge as if he witnessed the operations in Ashton's own clinic. The book has been revised to "right now" and every old operation and treatment not accepted now have been omitted and new ones added. Throughout the entire work one recognizes the fact that the book must be ranked second to no work on gynecology.

S. W. JOHNSTON.

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*SOME UNUSUAL ABDOMINAL CASES.

S. H. HAIRSTON B.Sc., M.D.,

MERIDIAN.

Case I. White man, age fifty-eight, had been having symptoms of gall-bladder trouble for the last thirty years. He gave a history of having had jaundice thirty years ago, also again ten and five years ago. This only lasted a very short time at each attack. During the last few years he has had repeated attacks of gall-stone colic and a constant symptom of "indigestion." At the time I saw him he was very tender over the region of the gall-bladder and there was a distinct tumefaction. He had lost fifty pounds of flesh and his skin had that muddy color.

I made an incision over the gall-bladder and found it about the size of your fist and full of stones. I examined the stomach very carefully and could find no evidences of an ulcer or any thickening of the stomach wall. It was normal in size and postion. There were no nodules in the liver, no induration or enlargement of the pancreas and no stenosis of the pylorus. The gall-bladder itself was free from any signs of malignancy and there were no stones in the common or hepatic ducts.

I opened the gall-bladder and found ninety-eight stones. He recovered from the anesthetic and got along first-class after the operation. He could eat most anything, his skin became clear, and he gained three pounds in weight. On the fourteenth day he had a terrific hemorrhage from the stomach from which he died in twenty-four hours. The hemorrhage kept up all during this time. The gall-bladder wound was still open but no blood came through the opening. Several cases are on record where this hemorrhage came from all the mucous membrane of the stomach and no particular ulceration.

Case II. White boy, age sixteen, a son of Case I. When I was called I found him suffering with an excruciating pain in the right lower quadrant. To my surprise this pain was not in-

*Read before the Lauderdale County Medical Society June 12th. 1913.

creased on pressure and he had no rigidity of the right rectus muscle. His pulse was 140 and his temperature was 103° F. I advised an operation but his father had died a short time before and he said he would rather wait. He made a slow recovery and in two weeks was able to be out.

One month later he had another attack that came on precisely as before. This time there was no rigidity of the right rectus muscle or increased pain on pressure. These signs were absent during the entire spell before. This time his pulse was 150, and temperature 102.6° F. On the third day his temperature disappeared and his pulse was 120. Here the pains lessened a great deal at McBurney's point and effected the inguinal canal. This was too painful to touch. I thought maybe a knuckle of bowel had got down there but I could place my finger in the internal ring and it was clear. That afternoon his right testicle began to swell and by the next morning it was as big as your two fists.

He decided on an operation and when I opened the abdomen I found an appendix about six inches long, strutted and just about ready to rupture. There were no adhesions and no obstruction to the inguinal canal. I removed the appendix and he made an uninterrupted recovery. His testicle was down to almost the normal size the next day. He had a large congenital hernia on the left side and I repaired that at this operation.

Case III. Negro preacher, aged forty. "The Lord touched his soul" and he was doing some "preachin' and shoutin'" when his hernia that he had for twenty years became strangulated. This was Wednesday night and he was brought to the hospital Sunday morning. His penis, scrotum and testicles were gangrenous and had partially sloughed away. I took all these "organs" away and resected eight and a half feet of small intestines that were gangrenous. He did nicely following this operation but died on the seventh day from a secondary operation for obstruction of the bowels. The omentum was wrapped around a loop of small intestines that produced the obstruction.

Case IV. White female, age twenty-five, unmarried, was weak, nervous and run-down. She suffered a constant pain and tenderness in the right side just below McBurney's point. On palpation a small tumefaction was noticed.

On opening the abdomen the appendix was normal but there was a mass just behind the cecum. I noticed too that she didn't have any Fallopian tube, ovary or broad ligament on the right side. I took this mass from under the cecum and found it to

be the right ovary. A small portion of tube was also there. Her health didn't improve much and I understand that since the operation she has showed up with pellagra.

Case V. White female, age forty-eight, is the mother of three children. Her mother died with some stomach trouble. For five years she has been having "indigestion" and pains in the "pit of her stomach." She had gradually lost flesh and strength and was becoming very anemic. She would vomit almost every day and at times this showed some blood. A small tumefaction could be outlined just over the pylorus. A stomach analysis showed a lack of free hydrochloric acid and the presence of lactic acid. The Oppler-Boas bacillus was there. No food was in the stomach after so many hours which showed no obstruction.

I told the family that everything in this case pointed to a cancer of the stomach. I advised an exploratory incision with the hope of being able to do a stomach resection if the disease hadn't progressed too far. I made an incision through the right rectus muscle and found a gall-bladder about the size of your fist filled with stones. I examined the stomach, liver, pancreas, appendix and hepatic and common bile ducts and could find absolutely nothing wrong. I removed seven large stones from the gall-bladder and put in a drain. She got along beautifully and was able to sit up in a week. She made a complete recovery and now is as well as she ever was in her life. Her cheeks have their normal color and she has fattened twenty pounds in five months.

This emphasizes the fact that you cannot rely too much on your stomach analysis and laboratory diagnosis. I always make thorough analysis of all cases but I do not let them influence my diagnosis one way or the other.

Case VI. White female, age forty, the mother of three children. The oldest fifteen years and the youngest four. She had been having irregular menses for three years. Several doctors told her she had a tumor and advised an operation. She had been having bad spells of asthma at the time. The uterus was up about half way to the umbilicus and was round and smooth.

I made an incision in the median line and found a large interstitial fibroid. After I took it out I opened it and found about a four-months' fetus. It had been dead for some time and was completely calcified. The patient recovered in the usual time.

*CANCER OF THE BREAST.

S. W. JOHNSTON M. D.,

VICKSBURG.

It is not my purpose or intention to go into the minute details of cancer of the breast, either from a pathological standpoint or one of treatment, but I want to state in as few words as possible my belief that in a vast majority of cases death from cancer is due to failure of early diagnosis or prompt treatment. This neglect or ignorance or carelessness, and I believe the last term will cover most cases, is surely responsible for many deaths and oh, such deaths—deaths that are most horrible and repulsive.

In an experience of four years as surgeon of the State Charity Hospital here, I had the fact brought home to me almost daily of the gross carelessness and negligence of a vast number of practitioners in our state. It was the rarest thing imaginable that we ever received a case of mammary cancer that had not advanced to such a stage that operation was useless. It is this fact that I ask your special attention to and I want to emphasize the statement that in a great manner the physicians are at fault in not making earlier diagnoses and urging prompt treatment.

The two forms of cancer of the breast that are most common and with which we most frequently meet are the scirrous or hard cancer and the medullary or soft cancer. To these we may add adeno-carcinoma and Paget's disease of the nipple. This probably is the most sensible method of classification and one easily understood. In the scirrous form the connective tissue predominates and we find very few epithelial cells in the mass while on the other hand in the medullary or soft form we find it composed almost entirely of epithelial cells with only now and then a few fibres of connective tissue interspersed among the cells.

The frequency of cancer of the breast is variously estimated by different investigators but it is the consensus of opinion that at least eighty per cent. of all tumors of the breast after the thirtieth year are malignant. Of this eighty per cent., carcinoma plays the greatest part. Billroth in a collection at random of four hundred and forty tumors of the breast found seventy per cent. cancerous. Williams in a collection of two thousand three hundred and ninety-seven cases found that

*Read before the Mississippi State Medical Association.

seventy-seven and seven-tenths were cancer. Surely in a condition where we find such a great majority of tumors to be carcinoma it behooves us to study each individual case carefully and skilfully, it matters not how benign and simple the condition may seem. Age plays the most prominent part in the etiology of the breast for we find that in at least eighty per cent. the tumor appears at or near the menopause. Do not, however, be misled into believing that you cannot have cancer earlier than that for you can, but the percentage is small. Cases, however, have been reported in women twenty years of age. Trauma also plays its part and a vast number of cases are able to trace the beginning of the tumor to a blow or fall upon the breast. Mastitis, too, influences the formation of cancer and some investigators claim that in from twenty to thirty per cent. of cases they have been able to associate puerperal mastitis with the tumor.

Heredity has been a factor in about twenty per cent. of cases according to different investigators and although some place this as low as three per cent. it is unquestionably an important point in early diagnosis.

Since forty-three per cent. of all cancers, according to Williams, occur in the breast, it becomes the most important subject with which the surgeon can deal. Cancer occurs in one breast as frequently as the other but the most common part of the breast is the upper outer hemisphere. This location in itself tends towards an early involvement of the axillary lymphatics—and a tumor appearing at this location surely should always be dealt with promptly and thoroughly. Since cancer travels exclusively through the lymphatic channels the earlier the diagnosis is made the more readily we can stop this natural involvement.

Unquestionably cancer is a disease due to a special microorganism and although no evidence has up to this time been found upon which to base this assertion it can only be a matter of a few years when the specific bacterium will be isolated, the failure no doubt being due to improper or imperfect methods of staining. It seemed that we would never be able to find the causative agent of syphilis but the most ignorant among us now know the specific cause. There is one point, however, that is perplexing to all and that is that cancer has almost doubled in frequency with the advance of civilization. Cancer now stands alone in that it is increasing more rapidly than any other disease while tuberculosis and kindred affections are rapidly decreasing.

The mortality is nearly a hundred per cent. in cases treated with palliative measures or operated upon after involvement of distant lymphatics, while on the other hand we get at least forty-five per cent. of cures in those seen early and given prompt treatment.

The diagnosis is not difficult in the majority of cases and the physician who sees a case early and fails to make a diagnosis and urge prompt treatment surely is responsible for the large death rate that we have. Any tumor developing in the breast after the thirtieth year may be looked upon as malignant and should be so considered until its benignancy is definitely established. This will be so rare that one should always give a grave diagnosis when first consulted. Even tumors that have existed since childhood and have seemed simple and benign frequently without any apparent cause rapidly undergo malignant degeneration. I recall a case of a young woman who had what was supposed to be a small sebaceous cyst which gave no discomfort nor inconvenience. After her marriage and after her third child the breast became inflamed and was diagnosed as simple mastitis. Eight months after this diagnosis was made I saw the woman, who then was thirty-six years old, and made a diagnosis of carcinoma. I advised operation but gave a very guarded prognosis. The axillary glands were matted together and the retraction of the nipple and attachment of the skin were extremely marked. I removed the breast and all the axillary and subclavicular glands with the entire muscular, glandular and skin tissues, according to Halsted's method. Two years later the disease recurred and a few weeks ago death came as a very sad ending of a late diagnosis.

On the other hand five years ago a patient from Greenwood, Miss., consulted me for a small tumor that appeared a few weeks earlier on the left breast immediately following a fall against a trunk. I diagnosed the case carcinoma. The entire breast was removed, with all muscular and lymphatic tissues. The microscopic report from Dr. Pothier of New Orleans was carcinoma. This was something over five years ago and up until now there has been no recurrence. I merely mention these two cases as being an example of late and early diagnosis. I might mention others similar but they would merely emphasize the fact that the high mortality is greatly due to the doctors who fail to early see the grave danger in all tumors of the breast. It is better to occasionally sacrifice a non-malignant breast than to have a large number die of carcinoma.

Whether you employ the method of Halsted, Warren or any other operator, the one idea to be followed is complete removal of all glandular, muscular and lymphatic tissues with as much skin as will leave enough for a flap. In all cases, gentlemen, consider a tumor of the breast malignant until you have beyond all shadow of a doubt proved its benignancy.

*INFANT FEEDING.

L. F. BARRIER M.D.,

GREENWOOD.

Not that I will add anything new to your knowledge of this subject, have I chosen infant feeding as a title to this paper, but because in recent years this Association has been nearly silent on a subject which is of far greater importance to ninety per cent. of the men present than the latest technique used by the surgeon in removing diseased tissue from the body; and knowing my own deficiency in regard to the proper feeding of children, I present this paper, feeling assured that, by your discussions, I will gain some ideas which may help me to same some unhappy child from weeks of suffering and death.

The recent investigations of the cause of infant mortality have emphasized the necessity of using mother's milk in feeding wherever possible and, where impossible, intelligently modified cow's milk. Under no circumstances should a mother be allowed to wean her child so long as she can provide it with a suitable breast-milk without endangering her own health; and where she is providing milk in too small quantities, this should be used, supplemented with some other form of food.

In those cases where the children must be weaned on account of pregnancy or lack of suitable milk, the question of feeding becomes simpler in proportion to the age and general condition of the child. Feeding a healthy child after the third month is not, as a general rule, a difficult task. These children should never be fed oftener than every four hours as the stomach seldom rids itself of cow's milk under three; and it is best to give one ounce more at each feeding than the supposed stomach capacity, for an over-filling of the stomach brings on a prompter and stronger churning of its contents, making the curds fewer and softer and a better mixing of the food with the stomach juices.

*Read before the Mississippi State Medical Association.

The following rule for the feeding of children between the third and ninth month, I have found to work well, keeping very near the formulas of the percentage feeders as well as those of the caloric. For each pound of weight, give one and one-half ounces of clean whole milk mixed with enough water to make each feeding one ounce more than the normal capacity of the stomach for that age. Knowing the normal stomach capacity of a child of the same age as the child to be fed, the number of daily feedings to be given, which between the third and ninth month should always be five, and the weight of the child, a suitable formula can be given at once. For instance, if the child is three months old and weighs twelve pounds, the amount of food given at each feeding should be five and a half ounces, one ounce more than the normal stomach capacity. The total amount of food for twenty-four hours would be the number of daily feedings multiplied by the amount of food given at each feeding, five by five and one-half, or twenty-seven and one-half ounces. Now the amount of milk to be given daily would be twelve by one and one-half, or one and one-half ounces to each pound of weight, eighteen ounces. The water to be added would be the difference between the total quantity of food and the amount of milk given, twenty-seven and one-half minus eighteen, or nine and one-half ounces. To this one ounce of malt extract should be added to supply the lack of sugar. I find malt extract to be the best form of sugar to use with modified milk, as it is less liable to cause fermentation than any other and is laxative. If the malt is too much a laxative, cane or milk sugar should be used instead.

The greatest cause of trouble in infants under three months comes, I think, in the stress put in recent years on the percentage method. I believe that the fat contents of mixtures used in early life is too high. Instead of top milk used, I think whole milk diluted with twice its volume of water will be found sufficient for the first three or four weeks of life. From the third or fourth week to the third month, a half milk and water mixture to which one-half ounce malt extract is added to the daily amount of food is sufficient for nutrition and growth. During the first three months, it is best to give the child only one-half ounce more food than the normal stomach capacity.

In all pathological conditions of the gastro-intestinal tract characterized by diarrhœa, I have made it a rule to withdraw all food for twenty-four hours, allowing water ad libitum. If the attack has been severe and the child under the third

month, I give half barley water and half sweet whey with as little sugar as possible. After the third day, I substitute skimmed or centrifuged milk for the whey. In older children, after the preliminary starvation, I use two ounces of skimmed or centrifuged milk to each pound of weight, substituting milk sugar in the smallest quantity the child will allow for the malt. As soon as the soft, pulpy, proteid stool appears, I begin the addition of fats and sugars, the fat in one-half tablespoonful quantities every other day, until whole milk can be substituted; sugar a little each day until the proper percentage is reached, continuing the use of lactose, unless the child begins to suffer with constipation, when malt extract is again substituted.

Large vigorous children may demand more fats than could be given by the strict following of the plan of feeding. In this case, the fats may be added in small amounts to each day's feeding until the proper percentage is reached. I have seldom seen this means necessary for as the child increases in weight, his amount of milk increases and with this the percentage of fat.

In a paper of this kind, the feeding of children suffering with marasmus cannot be discussed, except in a general way. These little patients are brought to us weighing less or no more than at birth, and we have no time to theorize or temporize, we must do.

In treating these cases, I have followed, with flattering results, the same diet used in treating diarrhœa, except I keep the child for a longer time on fat free milk; not beginning cream until the middle of the second week. Little fat and sugar is necessary in treating these cases because the principal cause of marasmus is a lack of proteid assimilation, produced, first, by too small amount allowed in food as in condensed milk and the proprietary foods, second, too much fat, this fat coating the small proteid curds so that nature cannot reach them with the peptonizing ferments and to overcome these conditions we must supply the form of food needed in as pure a state as possible. We see a few cases, however, where nature seems to be at fault, the child's digestion being perfect so long as food is given in quantities too small to preserve nutrition. Should the amount of food be raised to a point compatible with life, digestive disturbances come on, often terminating life. I have seen one case, which after four weeks' battle against death, the same food being used continuously, nature suddenly asserted herself and the child began to assimilate.

During the eighth and ninth months, there is a tendency to

constipation in all milk-fed children. This is a sign that the body demands more carbohydrates than before. This element should be supplied by gruels, barley excepted. These gruels should be cooked not less than three hours, slightly sweetened and fed to the child between feedings or added to the milk at feeding time. The child should now be taught to drink its milk out of a glass or mug, the bottle being discarded.

Fruit juices should be added to the diet before the tenth month, these being given between feedings so as not to interfere with milk digestion. As the diet list is broadened, the proportion of milk should be lessened, though it should still be the chief article of food.

By the twelfth month, baked potatoes, rice, oatmeal, and strained soup from potatoes, spinach, carrots and asparagus, should be added. By the fifteenth month, toast, zwiebach or Graham crackers may be allowed.

During the fifteenth or sixteenth months, such vegetables as carrots, spinach, asparagus, pressed through a sieve, may be added alone or in jellies. From the eighteenth to the twentieth month, small particles of chicken or other poultry, steak and mutton may be given. From this time on, there should be a gradual broadening of the diet until all plain wholesome foods can be eaten by the child.

In my experience, the feeding of children has not been, as a rule, a difficult task, when I get a child well started, but one fear comes to me, carelessness on my part or that of the mother.

We must preach carefulness in infant feeding continuously; care in milking and keeping the milk; care with bottles and other utensils in preparing a child's food; and, if we are careful and impress the mother with the necessity of carefulness, we will not often fail.

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*A DISCUSSION OF CHRONIC MALARIA AND MALARIAL RELAPSE.

C. C. BASS M.D.,

NEW ORLEANS, LA.

The acute symptoms of malaria, chiefly chills and fever, and other symptoms produced by them, result from the effect of toxin on certain nerve tissues, which control the vascular apparatus and the heat regulation of the body. The nature of

*Read before the Mississippi State Medical Association.

this toxin is not now well understood, but it is quite possible that it will be found to be very simple when it is understood.

The two common species of malarial plasmodia in this country segment about every forty-eight hours. A parasite grows from the youngest and smallest size, in or on the red cell, consuming the cell as it develops, until it reaches maturity at this age. The parasite now segments giving rise to fifteen to thirty young parasites (merozoites) most of which are killed by the serum or leucocytes. A few, however, succeed in attaching themselves to the new red cells and pass through a similar cycle of development. In the instance of tertian malaria, there is a great tendency for the parasites to develop and segment by crops to the extent that most or all of the parasites that are to segment on a given day segment within a few minutes of the same time. The liberation into the blood of a large amount of this toxin at one time produces considerable damage to the nerve control of the vascular system. The general relaxation of the vascular system results in most of the blood of the body collecting in the large vessels and abdominal viscera producing general anemia of the surface of the body. The small amount of blood circulating through the surface is insufficient to permit reduction of temperature of the body by the surrounding air and the patient develops a chill. The nerve centers rally from this shock in a short time and fever follows as a result of the influence of the toxin on the heat regulating centers. In the course of a few hours the toxin is neutralized or eliminated. The temperature returns to normal and the patient feels fairly well until segmentation of another crop of parasites occurs when chill and fever occur again.

There is not the same strong tendency to segmentation by crops by the estivo-autumnal parasite, but each parasite segments apparently independently of each other and there is therefore more or less segmentation going on all the time. The continued liberation of toxin produces continued fever. In a good many instances there is sufficient segmentation in crops to produce chills, but in many others no chill occurs.

Every time sufficient malarial plasmodia segment to produce chill or fever, countless millions of red cells have been consumed and destroyed. The hemoglobin is split up into globin which goes to make the cystoplasm of the parasite and hematin, which forms the insoluble pigment granules to be seen on the parasite. When the young segments and the pig-

ment are liberated into the blood plasma most of the parasites are destroyed and the pigment is phagocyted by various cells of the body, mainly the endothelial cells. The spleen and liver cells get a large amount of the pigment, but often much of it is deposited in cells of the capillaries of the skin. This gives rise to the familiar malarial cachexia. It also gives rise to the enlargement of the spleen commonly called fever cake or ague cake.

It requires many months or years for the processes of the body to remove these insoluble granules of pigment. It may often require several days, weeks or months for nature to replace the destroyed red cells after the destruction has been stopped. This cachexia and anemia are often erroneously called chronic malaria when in reality they are the result of the disease.

When malaria is not treated or is improperly treated, it may continue for days or weeks and might be called chronic. It never continues, however, if properly treated. The segmenting parasites described as giving rise to the symptoms of malaria are destroyed in from twenty-four to forty-eight hours by the proper amount of quinine. In exceptional cases a few living parasites may be found a few hours after forty-eight of proper quinine treatment, but these are extremely rare. Thirty grains of quinine a day will always accomplish this result. Less than ten grains daily will often fail and sometimes twenty grains daily may require three or four days to destroy all segmenting parasites.

After all segmenting parasites have been destroyed and thereby the acute symptoms of malaria have been stopped, the patient would remain well unless reinfected, were it not for the relapse which may come seven, fourteen, twenty-one or twenty-eight days afterward. This relapse is not supposed to be due to segmenting parasites that escaped destruction by the quinine, but by another form of parasite—the sexual form. These sexual parasites are not present during the first few days of the disease, but varying, usually small, numbers of them develop after the disease has existed for several days. They are the more resistant form of the parasite and are the only form that can reproduce in the mosquito. Their cycle of reproduction seems to be about seven days and it is probably their reproduction which gives rise to the relapses on the seventh or multiples of the seventh day. Their reproduction gives rise to another brood of asexual parasites which can produce active symptoms again and thus relapse is established. It

might be well to say here that quinine kills the asexual parasites produced by them.

Malarial relapse after longer intervals than four weeks sometimes occurs. The explanation is that such patients have developed so high a degre of immunity that the parasites reproduce in extremely small numbers, but sufficient to continue the infection, though not sufficient to produce symptoms or for the parasites to be found in the blood. As long as the patient's general vitality remains good, active malarial symptoms do not develop, but if something occurs which lowers this vitality, like an injury, shock, other diseases, change of climate, or change of season, etc., the parasites are liable to reproduce more rapidly and relapse occurs.

Another source of supposed relapse is reinfection. If it happens that there is a malaria carrier or case of malaria in a residence and anopheles mosquitoes bite him, they become infected and capable of transmitting the infection to others. Such mosquito or mosquitoes usually remain in or about the house and are a source of infection as long as they live during the warm season. A person may have malaria, take enough quinine to destroy all the parasites in his blood and after being well several days or weeks, be reinfected by mosquitoes he, himself, had infected. After a case or two of malaria has occurred in a house where anopheles mosquitoes come for their blood meals, it is to be expected that between the residents of the house and the mosquitoes infection will be kept there until cool weather sets in.

Malarial plasmodia cannot reproduce and in fact their sporozoites die out in mosquitoes exposed for any considerable length of time to a temperature below sixty degrees F. Mosquitoes do not therefore carry malaria from person to person more than a few months at most. During the remaining months there may be relapses, but there are no new cases of malaria. The best time, therefore, to get entirely rid of malaria infection would be during the cool months when there is no danger of infection.

We have said that quinine will not kill the sexual parasites; in fact an insufficient amount of quinine causes a great increase in their numbers and actually makes relapse the more certain.

Sexual malarial plasmodia either reproduce or die of old age probably within six weeks. Though we cannot kill these parasites with quinine or any other known drugs, we can kill

the produce of their reproduction with it. All that is necessary is to have the patient take a full daily quantity of quinine during one or two days of six consecutive weeks. It is the duty of a physician, who treats a case of active malaria, to instruct the patient accordingly before discharging him.

If everybody who had malaria during a given year would take quinine properly during the following winter when the organisms are not carried by mosquitoes, we should have no more malaria.

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*DIPHTHERIA.

S. R. HUMPHRIES M.D.,

JACKSON.

Diphtheria is an acute, infectious and contagious disease, generally of air passages, characterized by the presence of a patch of dirty white or grayish membrane, in cultures from which may be found the specific organism of the disease, namely, the Klebs-Lœffler bacillus or bacillus diphtheriæ.

The object of this paper is not to burden your minds with a repetition of the facts with which most of us are more or less familiar, but is to lay special stress upon conditions existing to-day, and to suggest such measures as may be helpful in improving these conditions. We all know what diphtheria means to the health of children individually and collectively, saying nothing of what it means to the community as a whole. We know that children under five years of age are more liable to the ravages of this disease than those of more mature years, and even though this is true from a standpoint of frequency of attacks and fatalities, after all we must acknowledge that the disease is not always a respecter of age, as the condition is often found in those of declining years, and I wish to say right here that it is my firm belief that diphtheria is often the cause of death when some other disease gets the credit. From the standpoint of treatment we have almost reached perfection, insofar as antitoxin is concerned, as in it we have a specific for the disease. From the standpoint of a complete cure it seems our methods are at fault, and it is reasonable to assume that many cases are dismissed as cured before a complete cure is brought about, or at least before the bacilli have disappeared from the nose and throat.

*Read before the Mississippi State Medical Association.

A question which has always concerned us, and is as yet unsolved is what is the source of infection in sporadic cases, and where does the disease get its start? Many are the theories regarding its etiology, such as damp soil, imperfect drainage, over-crowding, unhygienic surroundings, such as decaying vegetable matter, heaps of refuse, the digging up of old drains connected with old dwelling houses, and the tearing up of streets, etc. All of these may be justly considered as predisposing causes, but they cannot of themselves start the disease without the bacilli are already present and the conditions made favorable for their growth. Climate and season of the year have their bearing, and as everyone knows, the disease is more prevalent during the winter months. The disease has been transmitted by domestic animals; dogs and cats have been known to carry the disease, and guinea-pigs and birds have been inoculated, but even with this knowledge at hand, we cannot always account for the sporadic case that has had no known exposure to anyone affected with the disease. In view of these facts it seems to me that after all there is one common source of the spread of this disease, namely, from some person who has had the disease, attended with all its clinical manifestations, and having been discharged before complete cure was affected, or from some one who harbors the bacilli either in the nose, throat or lungs, and has never shown the typical clinical manifestations of the disease, and is unaware of its existence. These two classes of individuals, constituting what can truly be called "diphtheria carriers," and are in themselves a constant source of danger and a menace to public health.

As a laboratory worker it has been my privilege on several occasions to see and make examinations for cases of this nature in which a tentative diagnosis of tuberculosis had been made by the attending physician, and a specimen of sputum in each case being sent for diagnosis revealed the presence of diphtheria bacilli instead of tubercle bacilli, and at present I have in the laboratory of the Mississippi State Board of Health records of several cases of this nature ranging in age from twenty to sixty years, and proving conclusively that diphtheria is not always typical in its manifestations, and may be mistaken for some other disease.

That diphtheria is a serious disease in this state is proven by the fact that in the Department of Vital Statistics fifty-four deaths were reported in November and December of 1912, and twenty-six in January and February of this year, though some of them were listed under the heading of "croup," it is reason-

able to suppose that true diphtheria was the cause of death in most cases. And it is highly probable that all cases dying from diphtheria were not reported.

The question that concerns us is how can we stamp out this disease, or reduce its prevalence to a minimum. The State Board of Health has no law relative to when a patient suffering from diphtheria should be dismissed as cured, and it is often the case that the physician is willing to discharge the patient when the membrane disappears and the patient claims to feel all right. The laboratory has proven beyond a doubt, that cases dismissed too soon are a constant source of danger to those with whom they come in contact. And after having had a rather large experience in the examination of swabs and cultures from infected throats, I have seen what most other laboratory workers have seen, namely, the persistence of the diphtheria bacilli in the nose and throat of those apparently cured for days, and even weeks after the membrane had disappeared, and instances are recorded where the bacilli were found in the throat as late as ninety to one hundred and twenty days after its disappearance.

With these facts before us, one can see at a glance the importance of thorough and systematic treatment. Some authors claim that two per cent. of all people carry the bacilli in their throats. This may or may not be true, but one fact which we are sure of is that a case should not be dismissed until the bacilli disappear from the nose and throat.

There is just one other point upon which I wish to lay special emphasis, that is, the systematic inspection of the nose and throat of public school children and children in the orphans homes and asylums. I believe there should be a State Board of Health law requiring this in the public schools before the opening of each and every session, and in the orphans homes at least twice yearly. Swabs should be made from the nose and throat of each child to determine the presence or absence of the bacilli, and when found the child should be isolated and proper treatment instituted, and this should be kept up until the child is proven by laboratory diagnosis to be free from the bacilli. Certainly with the laboratory facilities which we have at our command to-day, no physician can excuse himself for giving freedom to his patients before the bacilli disappear, regardless of the pressure that may be brought to bear upon him by the members of the family.

MISSISSIPPI MEDICAL MONTHLY.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

"The natural articulation of organized medicine in this region is, first, the county medical society, next the State medical association, and then, as the fruitful flowering of the whole beneficient development, the Southern Medical Association. The southern doctor who would keep abreast of the rush of progress will find many organizations that may be of advantage to him, but these three he *must* personally support. They are indispensible."—Editorial *Journal S. M. A.*

"Every physician should identify himself with the organized body of his profession as represented in the community in which he resides. All county societies thus organized ought to place themselves in affiliation with their respective state associations, and these, in turn, with the American Medical Association."—*Code of Ethics.*

"Look on this picture, and on this." We are loth to criticize the Southern Medical Association, for it has done and is doing excellent work and there is a decided need for an organization working along the lines originally planned for the S. M. A.; especially are we averse to doing so just now when, for the first time in its history, the S. M. A. shows an intention of obeying its own laws and limiting its membership to the members of the various state associations over which it tries to establish jurisdiction—by suggestion, at least. But the contrast in the above quotations is too much in line with recent public remarks of the president of the S. M. A. for us to think the failure of the editorial to mention the American Medical Association an oversight.

We admit a failure to find many of the things we would like to see in the national organization. We admit that many of the arguments used by S. M. A. "boosters"—that one gets lost at an A. M. A. meeting, that the number of its sections

keeps anybody but a specialist busy hunting for papers he wants to hear, etc.—fit us like an old shoe, but ten years' active service in a state association—as member, delegate, committeeman, councilor and secretary—has convinced the writer that if for no other reason than that contained in the old saw "United we stand, divided we fall" we must "cut out" sectionalism and prejudice and stand together. Simply because our fathers "got theirs" fifty years ago is no reason why we should keep chips on our shoulders to-day. The north has forgotten it. Dreaming eternally of the past is only a handicap—especially for the fellow who didn't win. Remember the cowboy's comment on the old song:

"For bonnie Annie Laurie I'd lay me doon and dee"—

"That's no way to win a girl; I'd git me oop and peetch into somebody." On the other hand, to "peetch into somebody" doesn't necessarily mean that we must "whale away" and try to break up everything in sight. The Medical profession has too much to accomplish, too many common battles to fight, to be carrying on a civil war. The S. M. A., especially if it takes in some more northern and western territory, may succeed in crippling the A. M. A., but what's the use in such waste of energy that might be better used in constructive work? We will be apt to find ourselves in a position to parody the well-worn words of Scott in this way:

"Breathes there the man, with soul so dead,
Who never to himself hath said,
When he, perchance, hath bumped his head,
Some phrase like 'Damn it!'"

Letter to The Editor.

My Dear Howard:

What's the matter with the office of president that it makes every man who reaches it move? It moved Curry to Jackson, Jones to Brookhaven, Williams to Gulfport, Glass to Lyon, and now Feemster to Tupelo. It's somewhat of a moving job!

Yours,

Dye.

Clarksdale, Miss., June 3, 1913.

The question asked in Dr. Dye's letter had already been asked us by another member and we were obliged to confess our ignorance. Will someone please enlighten us; perhaps one of the five gentlemen mentioned can do so.

Book Reviews.

INTERNATIONAL CLINICS. A Quarterly Of Illustrated Clinical Lectures And Especially Prepared Original Articles. Edited by H. W. Cattell A.M., M.D. Vol. I, Series 23. J. B. Lippincott Co., New York. Price $2.00.

"Clinical Symptoms And Diagnosis of Gall-Stones" is a subject that always attracts our attention in this section, "Intestinal Auto-Intoxication" is a timely subject, we are interested in "Retarded Mental Development In Children" and our surgeons are interested, as always, in "Transplantation Of Tissues." Besides these articles there are others on diagnosis, treatment, pediatrics and surgery and one on obstetrics on a subject that is always needed, the care of the parturient woman. There is also the annual feature, the Progress Of Medicine during the past year.

E. F. HOWARD.

THE NARCOTIC DRUG DISEASES AND ALLIED AILMENTS. By Geo. E. Pettey M.D., Memphis, Tenn. Illustrated. F. A. Davis Co., Philadelphia.

Dr. Pettey's work along these lines in the past few years has been quite well known through this section of the country and while the reviewer has no personal knowledge of it and—perhaps because of such lack—labors with a deep-rooted skepticism as to the permanency of such cures, he is quite willing to accept the testimony of others that the doctor is doing a fine work.

In his book, Dr. Pettey goes fully into history, symptomatology, pathology, etiology, and then discusses treatment in great detail, pointing out the reasons for failure in treatment, and for relapses, and giving minute descriptions as to the guarding against them and the after-care of the patient. There is also an interesting review of the literature. Morphinism is the condition chiefly stressed, of course, but the cocaine habit and alcoholism are also considered.

E. F. HOWARD.

SEX: ITS ORIGIN AND DETERMINATION. By Thos. E. Reed M.D., Middletown, Ohio. Rebman Company, 141-5 W. 36th. Street, New York. Price $3.00.

This old and much disputed subject bobs up in a new form. After a very elaborate and scholarly discussion of the various theories suggested to date the author brings forward the idea that the moon is what does the business. He does not follow the old superstition that potatoes and other root crops should be planted in "the dark of the moon," and things fruiting above ground, as corn or tomatoes, in "the light of the moon.' His method is more subtile and provides for a diurnal cycle. Follow the tides. Boys are planted at or near high tide, girls at or near low tide. If you don't live near the seashore get an almanac.

E. F. HOWARD.

THERAPEUTICS OF THE GASTRO-INTESTINAL TRACT. By Dr. Carl Wegele. Translated and edited by Drs. M. H. Gross and I. W. Held. Rebman Company, 140-5 W. 35th. St., New York. Price $3.00.

Though ostensibly a work on therapeutics the reader will find many valuable details of diagnosis, especially on chemical examination of the gastric juice and X-ray diagnosis. The pages devoted to dietetics are especially valuable, and those on physical and medicinal treatment, especially the former, could hardly be bettered. The book is more than its name

implies. After general conditions and principles, it begins its detailed description with the esophagus and goes through, diagnosis, etiology, symptomatology and all, clear through to the anus. If a second edition be needed we suggest that the first two words of the title be amputated, or better still, add a chapter on the mouth and pharynx and call it "The Alimentary Canal."

E. F. HOWARD.

STERILITY IN THE MALE AND FEMALE AND ITS TREATMENT. By Max Hubner M.D., Chief of the Genito-urinary Department, Harlem Hospital Dispensary, New York. Rebman Company, 141-5 W. 35th. St., New York. Price $2.00.

Dr. Hubner's study of the causes of sterility has evidently been profound. His methods are careful, his reasoning clear, his deductions sound. The pathological conditions, anatomical abnormalities, sexual passions, functional pecularities, all have been carefully weighed and considered as possible causes and their relationship to the condition fully worked out. The reviewer has not seen so good a guide to follow when trying to solve one of these cases, which are the cause of so much distress and unhappiness.

E. F. HOWARD.

VACCINE AND SERUM THERAPY INCLUDING ALSO A STUDY OF INFECTIONS, THEORIES OF IMMUNITY, SPECIFIC DIAGNOSIS AND CHEMO-THERAPY. By Edwin Henry Shores B.S., M.D., Dr. P. H., 2nd. revised edition. St. Louis, C. V. Mosby Co., 1913. Price $3.00.

If there is one subject upon which the profession to-day is more ignorant of than any other, it is the subject of vaccine and serum therapy. Practically all of our knowledge comes from a great pharmaceutical house like Parke, Davis & Co., who have not only developed the serum and vaccine business, but supplied the profession gratis with all the literature. This has been the only source from which the profession at large derived its knowledge of the great advances made in serology for the journals at the command of the average told him nothing. This book attempts to remedy these conditions and place before the profession a lucid account of serum therapy up to the minute in such non-technical language that he who runs may read, and we everyday practitioners must take our literature in such easily assimlable form or not take it at all.

The subject of specific therapy is one that is becoming more important daily, so much so that the J. M. A. A. is publishing a series of articles upon specific vaccines. The public is inquiring why we don't use this or that vaccine and this work contains an up-to-the-minute exposition of the whole subject, the favorable and unfavorable effects being judicially presented. As such, it ought to have an enthusiastic welcome.

S. MYER.

MISSISSIPPI MEDICAL MONTHLY

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*IMMUNITY.

W. A. DEARMAN M.D.,
LONG BEACH.

With the establishment of the germ theory of certain diseases and the development of information concerning immunity, new methods of specific treatment were made possible and are now practiced under the name of serum and vaccine therapy. As might be expected the medical profession has been much interested in these methods and has applied them whenever possible.

The general practitioner has not been able to keep pace with the developments and literature on the subject of immunity, and finally has been forced to depend on the statements coming from laboratories and enthusiasts.

In this article an attempt will be made to state concisely and accurately the present knowledge concerning immunity.

We often speak empirically of the natural powers of resistance of the human body, yet not fully appreciating the true significance of our assertion. It was thought at one time, that immunity was due to an individual having passed through a severe or modified form of a disease and that the pabulum that the special infecting agent thrived upon was used up and therefore the disease was arrested as soon as this food supply was exhausted, this theory has been laid aside, for we know and are convinced that relapses are common, notably in typhoid, rheumatism, etc.

In dealing with this subject it will be necessary to mention briefly something in regard to infections, in order to lay the foundation for a more satisfactory and intelligent explanation concerned in immunity.

By the term infection we understand the entrance of microparasitic living agents or organisms into the body tissue or substance, and the occurrence of definite symptoms of disease as

*Read before the Harrison County Medical Society.

the result of the multiplication and activity of the invading organisms.

Infections do not always occur when pathogenic micro-organisms are present in the body tissues; there being certain conditions necessary for the establishment of a bacterial disease. These conditions may be broadly divided into two classes: those depending upon the infecting organism (virulence, pathogenicity, toxicity, and those depending upon the conditions in the host and tissues invaded.

Of the biological characters of importance in the infecting organisms in the production of a bacterial disease, the most important are that they must be able to multiply rapidly and greatly in the tissues of the body, they must be able to produce poisons or substances harmful to either some or all of the tissues of the body.

The number of organisms necessary to cause disease varies with different species (pathogenicity); many more staphylococci are necessary to cause the formation of a furuncle, than of anthrax bacilli to cause anthrax. The property that bacteria have to produce substances poisonous to the tissues generally determines their virulence.

That virulence is of great importance is evident from the fact that innumerable so-called saprophytic bacteria which are present in the different parts of the body grow and multiply there because in their growth sufficient poison is not produced and cannot cause symptoms of disease.

The virulence of an organism according to numerous investigators depends upon the presence of certain substances in the parasite which lower the resistance of the body and its tissues; these substances are variously designated as lysins and aggressins, depending upon the conditions of the host and tissues invaded. Certain conditions must exist in the host or body so that infection can occur.

We know that certain animals are insusceptible to the action of certain species of micro-organisms; *i. e.* horses and other domestic animals are naturally immune to venereal diseases, and most notably the hen to tetanus; and again certain organisms and can only produce disease when they are present in certain parts of the body and have entered the body by certain portals of entry.

The spirillum of cholera can only produce its typical form of disease when it has gained entrance through the small intestine; invasion of the derma or epidermis by this organism

produces no disease. The tubercle bacillus, as well as certain other organisms, can cause infection when they have entered through the skin or through the mucous membrane; while certain organisms as the bacillus of diphtheria, bacillus of tuberculosis and the bacillus typhosus show predilection for certain tissues, but will also produce disease in other parts of the body.

In addition to the non-susceptibility of the host, the body possesses natural barriers to disease, which must be overcome before infection can occur.

The unbroken skin usually offers a barrier to infection, the epithelial layer playing the part. Age, sex, race, occupation and environment account for certain resistance to invasion of organisms as is evidenced by the fact that for the bacillus of tetanus a wound is necessary to produce lock-jaw, while with the glanders bacillus, even the slightest abrasion of the mucous membrane will furnish a focus for infection.

The body fluids, lymph glands and phagocytes all offer resistance to infection. The lochial discharge is in all probability nature's method of protecting women against puerperal sepsis by constantly bathing the parts with fresh blood serum rich in germicidal properties, a very fortunate circumstance for the obstetrician, especially when we hear such grave criticism on the part of other members of the profession when there happens to be several cases of sepsis following in the train of a fellow practitioner's activities in attending women in confinement. It is quite common in puerperal sepsis to note the suppression of the lochial flow before the onset of infection.

Metchikoff first discovered the phagocytic activity of the white blood cells while observing the circulation in a frog's foot. He noticed that certain protoplasmic particles were ingested by the cells.

Owing to the conflicting opinions as to the origin, nature and function of the various leucocytes, their classification is still in a state of confusion, however the polymorphonuclear neutrophiles which compose about seventy-five per cent. of the white blood cells are the most active phagocytes and are the ones used in making opsonic determinations. The large mononuclears are said to incorporate and ingest the granular material of malarial parasites; on the other hand, the lymphocytes are said by Gerald Webb, of Colorado Springs, to be the only leucocyte that is capable of engulfing and disposing of the tubercle bacillus, having the power to dissolve the waxy capsule which gives this bacillus its great power of resistance; and

when we recall the fact that in most all tuberculous conditions we find a notable increase in this particular cell (lymphocytosis) we are not disposed to doubt his hypothesis.

Another important factor in immunity is bacterialysis or disintegration of the bacterial body by the blood serum. This biological phenomenon is brought about by certain substances being formed in the body during an infection that are generically termed amboceptors, and amboceptors are specific in their action, only affecting the bacteria that produced them.

There is normally in the blood of every individual a substance called complement, thermolabile, destroyed at 56° C. for one-half hour and by ageing, which is not specific but combines with any amboceptor and brings about bacteriolysis. The bacterial body first combines with its amboceptor, then through the complement the bacterial body is disintegrated. The typhoid bacillus in this instance would liberate its toxin as its toxin is intracellular (endotoxin).

The aim of vaccine therapy to-day is to increase opsonins, from a Greek word meaning "I prepare food for." Opsonins so modify bacteria that they are more readily engulfed and disposed of by the leucocytes, thus leaving the toxins of the bacterium in question unaffected.

An antitoxin neutralizes the poison (toxin) and leaves the bacterium unaffected.

When pathogenic micro-organisms are very virulent the white cells may be very active in engufing them, but on account of such virulent characteristics the bacterium is not killed but the leucocyte is killed after having wandered to some other organ or some other tissue. When such is the case we find metastatic foci of infection, etc.

It occasionally happens that the phagocytes are unable to engulf all bacteria or pathogenic micro-organisms, as for example in streptococcus infections, the cocci being in such long chains that the cell is incapacitated to incorporate such a chain of invading organisms, therefore the obstinancy of such conditions when we come to institute therapeutic measures.

Exposure, hunger, emotion, excesses, mental worry and certain diseases lower the powers of resistance, so that while individuals may be immune at one time, they may be at other times very susceptible to the same infectious agent.

In order to avoid going into technical details, the quantitative considerations of the blood cells and body fluids have been omitted.

Immunity may be natural (heredity) or acquired (during life). Acquired immunity may be active or passive. Experimental active immunity is usually called vaccination and generally produces in the individual a modified form of the disease.

After the formation of immunizing substances they do not remain indefinitely in the body but are lost through the excretions either as immune bodies broken down by the body cells, or the cells become immune and do not respond to the stimuli of the toxins being elaborated by the invading organism.

Wright of England has rightly said: "The future doctor will be an immunizator."

For some years I have been profoundly impressed with the idea that if we are to be successful, scientific, and approach nature's method of combatting infections, we must narrow our field, broaden our vision and attempt to fully understand the exciting cause of diseases and then make an effort to strengthen the various antagonistic forces of body. For after all with only few exceptions we wait patiently for our patients to approach the crisis in pneumonia, the lowering of the temperature of an individual who has been profoundly toxic from typhoid, for the prodromes, invasion, eruption and desquamation in the exanthemata, with the probable exception of diphtheria, for which we have a specific.

*THE CARE OF THE MOUTH DURING SICKNESS.

J. H. BROWN D.D.S.,
NEWTON.

Gentlemen of the Tri-County Medical Association:

I have been asked to read you a paper on the care of the mouth during sickness and will add a few points on oral hygiene. I do not come before you to-day to bring you to task, or to tell you of the failure of your duty, or to tell you things which you do not already know, but only to bring this very important subject before you to cause you to think and to put into practice these things which you already know. I have never been an advocate for the differences which now exist between some of the dentists and the physicians who are spending all their valuable time trying to define the point where the M.D.'s should leave off and the D.D.S.'s begin, but wish for us all to work together as one profession for the benefit of the human race.

*Read before the Newton-Neshoba-Winston County Medical Society.

I want your co-operation and help in this work and we may in time accomplish something of which we are greatly in need and of which we will be proud.

The mouth is the most neglected portion of the body and especially during sickness; there are all the germs known to science found in the mouth and, I will venture to say, some that are not named. I notice there are a great many of our M.D.'s as well as the D.D.S.'s who do not take the proper care of their own mouths, and how could we advise people what to do, and how to do it, and to have the desired effect unless our own mouths are in a hygienic condition? A great many times ours are worse than the patients to whom we administer, so we should begin at home with ourselves and then branch out with our own family.

I do not feel that I could give you any set rule to go by, and even if I could I do not feel that I could tell you more than you already know, or get from your text-books, but the point to get is this: clean the mouth and keep it clean.

You have all noticed the great change which you will see in the mouth of a sick person after a prolonged illness, to note the destruction from rapid decay due to the long period of neglected mouth hygiene. It is true that most of the evidence comes to the dental surgeon, the nurses of the hospitals and those who attend to the patient. Now I do not wish to criticise, but there is too little attention given to the mouth at this time, and I wish to show you the importance of it. There are some futile efforts made by all in attendance at times, but not enough to maintain a clean and hygienic condition of the oral cavity. In a great many cases a hygienic condition of the mouth is very essential for the case under care. Then we are not doing our full duty to the sick and helpless who come into our care. Do you suppose a nurse would knowingly for a moment shirk her duty in the administering of medicines left by the physician, or would she fail to bathe or nourish her patient, or to take the temperature at the proper time and to take it correctly? You would say no. Then why do you not more carefully instruct her, and show to her the great importance of oral hygiene? The patient's mouth should be the meter by which should be registered the ability of the nurse in attendance.

You may say that the facilities at hand are poor and inadequate, or that the time is too much taken up with other things at the time, but you can make an honest effort and do your best, can try and make a start and later you can accomplish a great deal.

In speaking of the facilities, I may mention a few that are in general use in some of the hospitals; a tongue scraper made of ivory and steel, together with a cotton swab; these are used more when the illness will not permit of the use of the brush. Good antiseptics and a good clean mouth-wash would help the feelings of the patient and assist to clean the oral cavity. There is nothing, however, that will take the place of a good brushing of the mouth and teeth. The massaging effect which this has on the tissues and the response which the oral cavity gives is a proof for the use of the brush freely. During a prolonged illness when the patient cannot use the teeth in mastication of hard food, offensive masses of mucus form on the gingival borders of the teeth (that is where the teeth and gums come together) which encourage the formation of other calcarious deposits, and thus we have a highly inflammatory condition of the mucous membrane while the patient is in this debilitated condition and is susceptible to any irritation.

The care of the teeth during pregnancy is of great importance, and you should see to it and caution should be given to take better care at that time than any other. You should prescribe a good alkaline mouth-wash to counteract the excess of acid secretion. I see so many cases come to me where the teeth are ruined from neglect and ignorance on the part of the patient.

The direct cause of decay is the lodgment of food particles between the teeth and on the teeth, and the fermentation of this food with the production of bacteria and acid which destroy the tooth substances. The foods that undergo these fermentations are chiefly carbohydrates, starches, sugars, just the character of food which a convalescent is likely to receive. This decomposition and fermentation begin very quickly, so the one in charge should direct attention immediately after the patient has partaken of food.

I sometimes feel that an illness is greatly prolonged by the unhealthy condition of the oral cavity, and no doubt some cases are cured by the institution of oral cleanliness along with the usual medical treatment.

Now this care of the adult in sickness is of great importance, but I consider the most important is the care of the child. We also have sick children and more especially at this time of the year. A child's health is as good as its teeth are good. They a great many times will resent any attention which you may give to the oral cavity, and will not allow you to come

close to them with a brush or any facility at hand, but did you ever see one of these little fellows who enjoyed a dose of oil especially after taking a few or is he willing under all persuasions to take it? How do you do? The usual way (since you and I were a child) hold his nose and prise his mouth open and force him to take it. I consider the care of the mouth equally as important, so in extreme cases we may resort to these means when every persuasion fails, but always do your best. Tell the little fellow what you will give him, try to bribe him in every way you can, try to win him over by letting him chew gum which of itself will have a tendency to clean the mouth, and then make him understand that his mouth must be brushed before he can have any more. Be sure to destroy the gum by burning it. The brush should be thoroughly cleansed and sterilized. In this way children can be brought through a long illness without the usual decay of their deciduous teeth, often preventing that most pitable condition, namely toothache, loss of teeth for masticating, which causes other serious trouble.

Nature intended the teeth to be the instruments of mastication and every lost tooth and every defective tooth, as well as every unclean tooth, is a handicap to nature's process of digestion and more so when the child is sick. This condition is usually accompanied with aching teeth, and how can a child improve under any treatment with this condition present? Within itself it will cause the child to have fever and disorders of other kinds.

The loss of sleep is a question which means more to the child at this time than any of our remedies. We see great strong men succumb completely, seem utterly unnerved from one night's suffering from tooth disorders, so we can expect less from the weak sick child to undergo the same torture.

And now, in conclusion, I ask you take an interest in the children as well as the adults, and do not permit yourselves to be of the class whose vision is limited to your own line and occupation, but to include in your life-work this one great principle: oral hygiene in sickness and in health.

SOME PATHOLOGICAL CONDITIONS FOLLOWING TYPHOID FEVER, WITH REPORT OF A CASE.

EUGENE S. BRAMLETT A.B., M.D.,
OXFORD.

In considering some of the pathological conditions following typhoid fever, let us first consider the cause with its effect upon the human organism. Typhoid fever is due primarily to a germ, the bacillus typhosus, first described by Eberth in 1880. This bacillus entering the mouth either from drinking water or food, may lodge upon the tonsil, which it readily invades, thereby causing an infection. If it does not stop in the mouth it goes into the stomach where it may be killed by the acid gastric juice if the bacilli are not too overwhelming, or the stomach abnormal in its secretive function.

If the bacilli are not killed in the stomach they soon invade the intestinal lymphatic tissue, probably through some abrasion. They seem to have some predilection for lymphoid tissues, hence Peyer's patches or the solitary glands are always involved. Thus we see readily the germ and its toxins may be carried directly into the blood current from the lymphatic system, thereby causing a systemic infection, from which no tissue of the body may be entirely free. Consequently we have numerous pathological conditions following typhoid fever, which have been produced either by the germ or its toxin.

Among these we may mention the following:

I. The Circulatory System.

The heart may become weak, due to degeneration of the myocardium.

Venous thrombosis often occurs especially in the veins of the lower extremity, causing what is known as phlegmasia dolens or milk leg.

The blood itself is very anæmic. The leucocytes are diminished in number.

II. Nervous System.

Neuritis occurs in small number of cases. It is sometimes general, but as a rule, the lower extremities are affected, causing a paraplegia.

Poliomyelitis may occur, which varies in severity.

Post-typhoid insanity is noticed in a limited number of cases. In my practice I have had two cases of post-

typhoid insanity, both dying soon after the symptoms of insanity came on.

III. Glandular System.

Among some of the glandular involvements we may have parotitis, which indicates a general infection.

Thyroiditis, orchitis and epididymitis, oophoritis, salpingitis, mastitis, pancreatitis.

The spleen is always enlarged in typhoid and sometimes ruptures. Any of these inflammations may go on to suppuration from which the typhoid bacillus may be obtained in pure culture.

The liver may undergo acute yellow atrophy, or may become the seat of abscess formation.

These abscesses are generally due to mixed infection, the infection taking place (1) through the blood coming from the portal vein (2) through blood by way of hepatic artery (3) as an ascending infection in the ducts.

Probably seventy-five per cent. of all cases of gall stones are caused by typhoid fever. You may have cholecystitis without the production of gall stones.

IV. The Osseous System.

Affections of the bones are by far the most frequent of the sequels of typhoid fever.

An interesting point in connection with the bacteriology of these cases is the finding of pure culture of the organism in sinuses, which have been present for years.

The relative frequency of this complication may be said to be due to the almost constant presence of the organism in the bone marrow, even in cases which have shown no evidence of bone infection. That the bacilli may be latent in the bone-marrow for long periods is undoubtedly proved by the occurence of typhoid bone lesions as long as six or seven years after the original attack of fever.

The tibia is most frequently involved, then the ribs, sternum, spine and costal cartilages.

Periostitis is by far the most common form seen, especially in the tibia.

Osteomyelitis is seen most frequently in the ribs.

Arthritis sometimes occurs, generally in one joint.

The lower extremities seem to be more frequently involved than the upper.

Ankylosis of the joint generally occurs.

V. The Muscular System.

Affections of the muscles are rare and usually occur during the course of the fever.

The right rectus muscle is the most frequently involved.

A degeneration of the muscle fibers takes place, due either to a granular or waxy change, which is followed by rupture.

VI. The Gastro-Intestinal Tract.

Among the lesions of the gastro-intestinal tract we may have glossitis and gangrene of the mouth, stricture of the esophagus and intestinal obstruction, which may be (a) functional, due to ileus or paresis from over-distention from gas, or (b) mechanical, confined to intussusception.

Appendicitis frequently occurs. After the ileum and cecum, the appendix is the next most frequent site of perforation.

Report Of Case.

On Sept. 2nd. 1911, I was called in the country to see Mr. R., whom I found suffering from typhoid fever. With the exception of four or five hemorrhages in the second week, he made an uneventful recovery, I dismissing him on Oct. 5th. In about ten days from this time he began to sit up, and in another week was walking about. During this time and the following weeks, he complained of sudden sharp pains in his right inguinal region. He would occasionally telephone me and I thinking his trouble due either to overeating or typhoid adhesions advised a dose of castor oil and turpentine, which always seemed to relieve him for a few days.

On Nov. 30th. I was called in a hurry to see him, his brother stating that he was "about to cramp to death." On reaching his bedside I found him suffering with pain, rigidity, and tenderness over McBurney's point, temperature 100° F., pulse 98. I told him that he had appendicitis, and advised an immediate operation. This he objected to and asked me to give him something for relief of pain. I gave him one-fourth grain morphia with one one-hundred-and-fiftieth atropin and put an ice bag over his appendix. The next morning about three o'clock I was summoned again, his brother stating that he did not believe he would live until I got there. I found him suffering intense pain, bent half-double and walking the floor. His whole abdomen was very rigid, temperature 102° F., pulse 120. No movement from his bowels for forty-eight hours. I

had to give him one-half grain morphia before I could relieve his pain. I then told him that he could not live without an operation and then the chances were against him. I advised him to call in another physician, which he did.

The other doctor arrived in about four or five hours. After consultation we finally agreed that the only chance was an operation, and that very slim. We hurried him to the hospital, six and a half miles, reaching there about five o'clock p. m. By this time he was swollen badly, pulse about 140, temperature 103° F.

We washed his stomach out, obtaining about half-gallon or more of green fluid. I then put him on the operating table and under ether anesthesia opened his abdomen over McBurney's point. I found his abdomen full of free pus, perforation (about as large as a dime) of the cecum at its appendicular attachment and the appendix hanging by a shred.

I removed the appendix and threw a purse-string suture around the cecal opening. I then drained him well, put him in the Fowler position and gave him the Murphy drip. After a siege of peritonitis, he finally recovered and was able to walk about in about four weeks. Except a slight ventral hernia, he is nearly as healthy a specimen of humanity as you will find anywhere.

This case of perforative appendicitis I believe was due entirely to typhoid infection. And I would urge you, who often treat typhoid fever, first, when your patient complains of pain in his belly, do not put him off by prescribing oil and turpentine, but look for his trouble. It may be appendicitis or a beginning perforation of the bowel. Second, if he develops appendicitis, or even if he has a perforation, operate on him immediately, for I believe by so doing, you will save the lives of a number of your patients, who, if left to nature, will surely die.

Current Literature.

A SIGN INDICATIVE OF CHRONIC APPENDICITIS.

C. D. Aaron, Detroit, in *Journal A. M. A.*, calls attention to a diagnostic sign which he has found exceeding valuable in deciding when and when not to recommend operation for chronic appendicitis. In many cases he has been able to induce a re-

ferred pain or distress in the epigastrium, left hypochondrium, umbilical, left inguinal or precordial region by a continuous firm pressure over the appendix at McBurney's point. The appendix was usually distorted, adherent or contracted and there was nearly always a history of a previous attack of appendicitis. All the patients on whom appendectomy has been performed have recovered from their apparent digestive disturbances. These symptoms were caused by an infringement on the nerves, which reflexly induced a perversion in the secretion of gastric juice. In view of the difficulty of diagnosis of chronic appendicitis without frequent recurring attacks, this symptom is of special value; moreover he thinks it will explain many cases of gastric and intestinal disease for which the appendix is responsible and may be the only part that requires attention. McBurney's tender point may be found in many cases of appendicitis though not in all, and this referred pain on pressure, Aaron thinks, is a valuable sign in the diagnosis of chronic appendicitis itself.

CEREBROSPINAL MENINGITIS.

In a series of atypical cases of cerebrospinal meningitis, the most constant symptoms found were a relative rigidity of the neck, Kernig's sign, vomiting and fever. The first afebrile case was cured after five doses of serum; the second one received only one injection of ten ccm. of serum, further treatment being refused. Two patients had hyperpyrexia, with temperatures of 107° and 107.8° respectively. The former died within twelve hours, but the latter had the temperature lowered to 103°, where it remained until death two days later. The mortality of this series of cases, thirty in number, was practically twenty-five per cent., including those moribund when seen. The prognosis is good in all cases with a cloudy spinal fluid, in which treatment is begun early in the disease, while it is uniformly bad in cases with clear fluid, irrespective of promptness in administering serum. Mexicans in spite of their squalid surroundings, seem to be more resistant and respond to treatment better than whites. Wesson gave the serum in all of his cases by the gravity method. If too much serum is injected or if the serum is injected with too great rapidity, there will be complaint of pain in the legs if the patient is conscious, or twitching if he is unconscious. The untoward effects from the serum are collapse and urticaria. Collapse is best treated by siphoning back the serum and keeping up artificial respiration; small

doses of atropin and epinephrin are of help. No treatment was used for the urticaria in Wesson's cases except sponging with a ten per cent. solution of menthol in alcohol to relieve itching. He concludes that the only early constant sign is a relative rigidity of the neck. A clear spinal fluid indicates a bad prognosis. The temperature is a misleading criterion as to the state of the disease; the treatment should be continued until the spinal fluid is sterile. The method of injection should be by gravity; the amount of fluid withdrawn bears no relation to the size of the dose of serum, which should be determined by: the rate of flow of the serum, the amount of discomfort caused the patient, and the quantity that can be given without using pressure. Serum should be given at least once a day, in severe cases every six hours. Vigorously treated cases, if seen early, will have no bad after effects.—Wesson in the *New York Medical Journal*.

THE CAUSE AND PREVENTION OF ADENOID GROWTHS IN CHILDREN.

Young children are almost chronic sufferers from nasal colds which prevent the use of the nose in breathing. The habit of mouth breathing is thus formed. Tonsillar and adenoid hypertrophy follow. The solution of the difficulty lies in the prevention of colds. The author believes that failure to change the napkins promptly, especially at night in winter, is the chief factor.—H. E. Jordan, University of Virginia, in *Archives of Pediatrics*.

TREATMENT OF ARTERIOSCLEROSIS.

The chief point to bear in mind is that a person with arteriosclerosis has a smaller working capacity than one with good elastic arteries. One must, therefore, insist that the body as a whole and the individual organs shall not be subjected to the same strain as before. If one finds that the sclerotic process involves certain organs more than others, one must particularly insist on rest for them, *e. g.*, the heart, the brain or the kidneys.

The question of diet is a practical one, but hard and fast rules do more harm than good. The doctrine that meat favors the development of arteriosclerosis and that the patient can be benefitted by forbidding meat, is without foundation. Above all, diet should be so regulated as to avoid all digestive disturbances. Heavy meals are to be forbidden; excessive gas formation must be avoided; regularity of the bowels is abso-

lutely essential. Any digestive disturbance, whether gastric or intestinal, is likely to force the diaphragm upward, cause irritation of the heart and increase the blood-pressure, and this must be avoided. The peculiarities of each individual case must be carefully studied in order to arrive at a suitable *regime*. All beverages which irritate the heart and blood-vessels and thus bring about marked fluctuations in blood-pressure must be excluded. The patient should be warned not to take too much fluid. About one and one-half liters—including everything in the way of fluid that is ingested—is quite enough. The more fluids one allows, the greater the strain on the arteries. By a judicious restriction of fluids one often sees an excessive blood-pressure reduced by twenty to forty millimeters and remaining permanently low.

Stimulation of the peripheral circulation is best fulfilled by means of systematic hydrotherapy, which may be employed in a variety of ways, always avoiding such procedures as are followed by rapid changes in the blood-pressure. Carbon dioxide baths and electric baths belong to the same therapeutic category. The proper employment of these methods has a distinct effect in dilating the peripheral arteries and thereby facilitating the circulation as a whole. At the same time there is a salutary effect on the nervous system.

The iodides often prove very useful in angina pectoris, both by mitigating the severity of the attacks and by diminishing their frequency. They are also indispensable where there is an undoubted syphilitic element, and often give excellent results in ocular affections dependent upon arteriosclerosis of the retinal artery.

In all other cases of arteriosclerosis the iodides often do harm. Some individuals merely suffer a pronounced loss of appetite; but quite often the administration of iodides brings about rapid destruction and absorption of the thyroid gland, with the development of acute hyperthyroidism, severe cardiac irritation, and sometimes glycosuria. Later the symptoms of myxedema develop.

The theobromine compounds deserve special mention, diuretin being the most frequently employed. It has the important property of dilating the small vessels of the heart and kidneys, thus improving the nutrition of these organs. Its favorable effects in angina pectoris are striking. It acts best, of course, in the spastic form of angina, which occurs with cardiac neuroses and particularly in association with tobacco heart.

So far as the coronary vessels are concerned, theobromine is a direct antidote of nicotine. The drug acts well in the genuine sclerotic form also. It is well borne, and the author knows a number of patients suffering from sclerotic angina, who have taken the remedy regularly for many years. If they discontinue its use for any length of time, they suffer relapse. One often finds a marked reduction of the blood-pressure after several weeks' administration of theobromine preparations.—Von Noorden in *Post-Graduate*.

DIFFICULTIES IN THE DIAGNOSIS OF GALL-STONES.

The following suggestions are offered to clear up the difficulties in diagnosis:

One must have a clear picture of gall-stone attacks. This is probably familiar to every one, and if not is to be found best in any surgical monograph upon the subject.

Never accept a diagnosis of acute indigestion as satisfactory unless the possibility of gall-bladder disease has been considered and definitely eliminated.

Resort to the use of the X-ray by an expert when there is a reasonable doubt as to the existence of renal or ureteral calculi.

Always consider with the greatest care and minutest scrutiny the history of each previous attack when the question of appendicitis is raised, paying particular attention to the time and apparent cause of the attacks, duration, degree of fever, of rigidity, and, later subsidence of the acute pain, the location and persistence of tenderness.

In connection with the history of pain it is interesting to note how many times repeated hypodermics of morphine have been found necessary in gall-stone attacks and how seldom they have been given, or at most repeated, in appendiceal attacks.

Carcinoma of the liver is nearly always a secondary growth and may or may not be associated with gall-bladder disease. When it occurs at the cystic end, there is continuously increasing involvement of the common duct, causing progressive jaundice. It must be remembered, however, that the early appearing jaundice accompanying carcinoma of the gall-bladder or ducts may be instrumental in causing a catarrhal jaundice which will clear up temporarily or to a limited extent under appropriate medical treatment, thus obscuring for a time the real gravity of the case, but in any considerable carcinomatous involvement of the common duct the jaundice is permanent and progressive. —Bunts in *Cleveland Medical Journal*.

MISSISSIPPI MEDICAL MONTHLY.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

The committee on public policy and legislation met in Jackson Tuesday, July 8th., to discuss the coming legislative campaign. At the request of President Feemster, Dr. Alexander, the president of the State Board of Health, appointed a committee to co-operate with it. There were present at the meeting President Feemster and Drs. W. S. Leathers, R. S. Curry and E. F. Howard of the Association committee; Dr. J. R. Jiggitts of the State Board committee, and Dr. E. H. Galloway, secretary of the State Board. The absentees were Dr. F. M. Sandifer of the Association committee and Drs. I. W. Cooper and T. Borroum of the State Board committee.

The body organized by electing Dr. Feemster chairman and Dr. Galloway secretary.

Various measures were discussed and the committee tentatively decided that it would request of the legislature an increased appropriation for the Board, a law requiring the registration of midwives a law requiring the use of measures to prevent ophthalmia neonatorum and the enactment of measures looking to care of consumptives. Dr. Leathers was appointed a sub-committee to obtain information as to what is being done in other states in the way of public care of tuberculosis patients.

A resolution was passed requesting the cities Natchez, Meridian, Jackson and Vicksburg to inaugurate methods of school inspection.

It was agreed that the committee should hold another meeting in October at which time these measures will be definitely

decided. The members of the auxiliary committee will then be given the definite data necessary to use on their legislators.

From the above it will be seen that the members of the auxiliary committee will have some work cut out for them this fall. The needs of the Board seems to be chiefly more help in the laboratory and means to provide for the collection of morbidity statistics. At present the laboratory is obliged to decline to examine many kinds of specimens and limit itself to the most essential work. Secretary Galloway estimates that the amount of material sent in, if all of it is to receive adequate attention, will require two more men. This speaks remarkably well for the popularity of the laboratory and definitedly demonstrates its right to more support. The value of morbidity statistics is too well known to need discussion here.

Since the above was written we learn, with much gratification, that school inspection has been done to a certan extent in Meridian, Drs. R. H. Foster and M. J. L. Hoye doing the work in cases where the parents could not afford the services of a physician. Of the first forty-eight children examined, selected by their teachers as being backward in class, forty-five were found to be in need of attention by either dentist or physician. Among the conditions found were dental caries, adenoids, hypertrophied tonsils, defects of vision, tuberculosis, malaria, pellagra, hookworm. Such conditions are by no means altogether without danger to the healthy pupils and Meridian's experience should serve as a wedge to open the way for school inspection throughout the state.

Society Proceedings.

East Mississippi Four-County Medical Society met at the Cotton Hotel, Amory, at 2 P. M., July 15th., to discuss the following program: papers by Drs. J. B. McElroy and W. B. Burns of Memphis and report of case of secondary hemorrhage following hemorrhoid operation by Dr. J. O. Gurney. Dr. J. T. Dabbs of Nettleton presented a clinic—cancer of the tongue.

F. J. Underwood.

Newton-Neshoba-Winston County Medical Society met in Newton June 10th., and had a fine session. Among other good things was a paper on the care of the mouth during sickness by a brother dentist, Dr. J. H. Brown of Newton, and the

Society appreciated it so much that they ask that you publish it. Good time for cold storage of teething babies and first-class doctors.

S. A. Majure.

Married.

June 20th. 1913.

Dear Howard:

I was married on June 15th., at Columbia, S. C., to Miss May Elma Seay of that place and in a short time I expect to have my feet resting on my own mantlepiece in Lyon, Miss.

With best wishes.

Your friend,

S. W. Glass.

Letter to The Editor.

Dr. E. F. Howard, Editor:

Vicksburg, Miss.:

Dear Doctor:—Some recent observations have made me suspicions that the use of "Sorghum" syrup may be a factor in the causation of Pellagra. I will ask the physicians who may treat cases this season to collect data in this respect.

Very truly,

James W. Gray.

Editor Mississppi Medical Monthly:

Dear Sir:—I note in the July issue of your journal of a review of a recent work entitled to "Sex Its Origin And Determination," by Thomas E. Reed M.D., published by the Rebman Company. I am not the author of this work but did have something to do with its preparation. As the review is so inaccurate and misleading I thought you might accord me some space in your columns for correction. This review is signed by E. F. Howard and occupies the space of nine lines. Of these nine lines, three are devoted to telling what theories of sex determination the author does not advocate. Four of the remainder are devoted to a statement of the theory as the reviewer seems to have understood it. In these four lines he

makes exactly four inaccurate statements. The principal one expressing first, his idea that the determination of sex is, according to the author, dependent upon the moon. The book does not make any such statement but does say that the determination of sex is dependent upon a lunar biological cycle corresponding to the lunar cycle.

Next the reviewer says that the author's method provides for a diurnal cycle. Evidently he does not know the difference between "lunar" and "diurnal." The author's theory has nothing to do with the diurnal biological cycle.

It is scarcely worth while to call attention to further inaccuracies, but it does seem hardly fair that so sincere and serious a scientific work should be given such a review in so important a journal as the *Mississippi Medical Monthly* is conceded to be.

The whole matter after all calls attention very strikingly to a deficiency in medical journalism that I have often regretted; that is indifferent and inadequate way in which important medical works are reviewed in the average medical journal. I am well acquainted with the troubles of the reviewer, having myself for several years reviewed a great variety of medical works for an eastern journal. I know that authors and publishers were not always satisfied with my reviews but there was one rule that I made, and always attempted to carry out; that was, when a book seemed to represent much labor and sincere effort on the part of the author, I always attempted to review it in somewhat the same spirit in which it was written.

The average review is too brief. It is quite impossible to represent or adequately comment upon the contracts of a four hundred-page book in four lines. If a longer notice could not, because of lack of space, be given, I much preferred to briefly state the intent and purpose of the book rather than run the risk of a thoughtless condemnation through an inadequate, trivial or "smart" review of what might be (or what years might prove to be) an important work.

Respectfully yours,

RALPH PAGE.

July 14th, 1913.

COMMENT: We apologize. It is a tidal cycle, nor diurnal, and to free ourselves of Dr. Reed's other criticisms we will quote a more lengthy comment from the *Interstate Medical Journal*, because we haven't time to write another—on that book—ourselves and the *Interstate* really expresses our sentiments perhaps better than we could do it.

After commenting on the fact that all theories of the determination of sex are widely separated and that Dr. Thomas Reed has disproven all others, the *Interstate* considers "the theory which Dr. Reed advances with the historical cock-sureness of all writers on this subject. And what a simple theory to understand, how it insinuates itself into the inmost recess of one's reasoning powers! Cloudland is forgotten for the nonce, and nature with her tidal ebb and flow is made the foundation of the idea that parturition is subject to a tide cycle—a positive one covering six hours followed by a negative one covering the same time. The average period of labor for primiparæ being eighteen hours and for multiparæ almost twelve hours, both are divisible by six, that is in the first we have three tide cycles— positive, negative and again positive, while in the latter we have but two—positive and negative. Suppose a primipara starts labor pains in the positive cycle, she then passes into the negative, and soon greets the positive again. But the multipara goes the primipara one better, since her period of labor covers only two cycles—positive and negative. Now with all this fully understood, what could be easier than to grasp the simplicity of the theory of sex determination! Just as labor is divisible into positive and negative tide cycles, so must sexual union be practised during the positive hours if a boy is desired or during the negative hours if a girl is craved. What the result would be if the impregnation took place just at the point where the positive hours become negative is not stated, but probably a hermaphrodite would result. Or perhaps either an effeminate man with from twenty to thirty per cent. of feminine qualities or a masculine woman with a like amount of masculine qualities. Shade of Otto Weininger take note!

"Whenever the writer of these lines reads a new tract on sex-origin determination, he invariably takes down from the bookshelf that most naive but highly instructive wor, "L' Art de proceer les sexes a volonte ou Histoire Physiologikue de la Generation Humaine" by Jacques-Andre Millot, Bachelor of Sciences and Letters, Member of the former College and Royal Academical Society of Medicine of Montpellier and Paris, etc. etc., and which was published in Paris in 1828. And diversion of no common order is his reward. Being the precursor of Dawson in the belief that the right ovary "supplies boys and the left girls," but not so confident that the ovaries can be depended on unless assisted by the parties interested in the sex of the future child, Millot gives the following instructions, entrancing on account of their simplicity: *C'est le dernier mouvement de la femme qui determine le sexe; 'est le cote sur lequel elle s'arrete au moment de l'ejaculation qui fournit le sexe toujours masculin lorsque la femme est plus inclinee sur le cote droit que sur le cote gauche et vice versa* (it is the last movement of the woman which determines the sex; the side on which she rests at the moment of ejaculation which will result always in the male sex when the woman is more inclined to the right side than the left and vice versa.)

"After reading these easily carried-out instructions, would one be justified in frittering away one's time praying to the gods without cessation to make Schenk's diet effective, Dawson's blind belief in the gender of the ovaries a verity, or Dr. Reed's positive and negative hours a surety? Very, no."

D. Appleton & Co., have as their Mississippi representative, Dr. I. Heinberg, of Monroe, La. Dr. Heinberg's literary attainments peculiarly fit him for the position of representative for so sterling a house as D. Appleton & Co., and in turn, D. Appleton & Co., may be considered extremely fortunate to be represented by so well-known, accomplished and polished a gentleman as Dr. I. Heinberg. The combination is hard to beat and we feel assured that all Mississippians will give a cordial welcome to Dr. Heinberg when he calls

upon them in the near future with the latest editions of medical publications.

Book Reviews.

DIET LISTS OF THE PRESBYTERIAN HOSPITAL, NEW YORK CITY. Complied, with notes, by Herbert S. Carter M.D., Assistant Visiting Physician to the Presbyterian Hospital, Associate in Medicine at Columbia University, etc. 12mo. of 129 pages. W. B. Saunders Company. Philadelphia and London. Cloth, $1.00 net.

It is not a bad idea for a physician to have something of this sort to fall back on when asked what a patient can have to eat. We are too prone to say "Oh. Anything light" or "Limit him to liquids," forgetting that in the first instance the unenlightened mind may translate it into side meat, cornbread and cabbage and that in the second a stomach utterly unqualified to manage it is apt to get milk.

E. F. HOWARD.

BLOOD-PRESSURE, FROM THE CLINICAL STANDPOINT. By Francis Ashley Faught M.D., of the Medico-Chirurgical College, Philadelphia. Octavo of 271 pages, illustrated. W. B. Saunders Company, Philadelphia. Price, $3.00 net.

The study of blood-pressures throws so much light on certain cases and gives the physician so much help in obscure conditions that it has very rightly grown in favor and its accurate determination and various interpretations have become part of our daily work. Dr. Faught, having devoted considerable time to such matters, has a right to be considered a master in the work and his book bears out such a claim. After a complete description of the methods of determining and interpreting blood-pressure he considers those conditions in which its study is of the most value. It is to be regretted that his literary style is a little unfortunate and that the proof-reader let some things "get by" him, as for instance where he speaks of "graphite records," meaning "graphic," or uses "phenomia" for "phenomena," but these little errors do not materially detract from the value of what is really a useful book.

E. F. HOWARD.

INTERNATIONAL CLINICS. A Quarterly Of Illustrated Clinical Lectures And Especially Prepared Articles. Vol II., Series 23. J. B. Lippincott Company, Philadelphia. Price, $2.00.

In the light of present-day medicine there are few of us who would not derive benefit from reading the leading article in this issue. Therapeutic Indications For Antitoxins, Serums And Vaccines, and though the author, Morton Illman of Templie University, sees the future of this therapy in what appears an unduly rosy light he unkuestionably gives us much food for thought. Paroxysmal Hemoglobinuria is the title of another article that we recommend to our brethren in the Delta. Terapeutic Exercises Performed Before A Mirror need not be limited to young ladies, and offer physicians whose patients cannot afford an orthopedist quite a valuable addition to their armamentarium. Our gynecologists will raise their hands in holy horror at, or derive considerable amusement from, Charles Reed's article on Hebosteotomy, and indeed it does heem that it is one procedure that ought to be forgotten. To Dr. Underwood of Nettleton we respectfully refer the article by Ballantyne of Edinburgh on The Prevention Of Eclampsia. The other articles are of rather greater merit than usual and we commend this number even more warmly than any we have yet seen.

E. F. HOWARD.

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*THE PRESENT DAY STATUS OF SURGERY OF THE APPENDIX.

J. W. BARKSDALE M.D.,
WINONA.

So much has been written within the past three decades on the subject of appendicitis that it would seem that long ere this the chaff should have been winnowed from the wheat and the golden grain of perfect understanding safely garnered into the storehouse of medical knowledge. Indeed, since this subject first began to be elucidated, it has perhaps been more fully exploited than any other condition in which modern surgical research has played so important a part. However, notwithstanding the almost numberless monographs and treatises more extensive that have been written concerning this protean and much vexed question, we are yet far afield from a happy and satisfactory settlement of it, on which both practitioners and surgeons are fully agreed. The main point at issue, namely, that it is a surgical affection, has long since been laid at rest, and there is, perhaps, no disease in which there is greater unanimity of opinion and harmony of thought concerning its ultimate disposition than this. Thus far, but unfortunately no farther, especially in rural communities, does this concert of thought seem to extend. There seems to be a lack of appreciation somewhere along the line as to the importance of very early operation and, by *very early*. I mean within twenty-four hours after the onset of an attack. Why this should be the case, I cannot say, for I believe the diagnosis is quickly made and the likelihood of serious complications thoroughly understood by the general practitioner. In a few cases, perhaps, the attack is attributed to some unoffending organ or falsely labeled as acute indigestion, colic or something of the sort, but I think these exceptions are very rare and if we remember that Murphy's "orderly sequence" of symptoms, pain, nausea, local tenderness and elevation of temperature, mean

*Prepared for the Mississippi State Medical Association.

appendicitis and nothing else, the diagnosis will be readily reached with every assurance of certainty.

It is charged, and with truth, that every case of appendicitis that goes on to abscess formation is an evidence of mismanagement somewhere or somehow, and yet, unhappily, in our state at least, the majority of the cases seeking surgical relief present this complication. For this I do not hold the profession altogether responsible, for in numbers of cases they have done their full duty in advising surgical treatment, to be thwarted by unwillingness on the part of the patient or his family, or the untimely protests of over-zealous but misguided friends.

Perhaps the greatest reason for delaying operation lies in the fact that certain so-called plans or methods of treatment are much in vogue. Of course, the Ochsner treatment has had the widest acceptance and is, I believe, responsible for a great deal of the mortality attending appendicitis. This, I think, is the result of a very general misinterpretation of the range of usefulness of this treatment, as intended by Dr. Ochsner, for whom I have the highest regard as a surgeon and as a teacher, and whose contributions to this subject and to surgery in general have made a lasting and well-deserved impress on medical thought. As intended by him, his plan of treatment was for cases inaccessible to the surgeon or for any reason inoperable, but by some it has been perverted into an elective treatment for all cases, as a result of which the patient has to run the gamut of all the threatening ills and complications which may occur, to find, in a large proportion of cases, that the surgeon is his court of last resort and that he must undergo an operation when the danger signals are all flying and the specter of death looms big with menace.

Another reason for delay lies in the fact that this, like so many other diseases, tends to spontaneous recovery and the practitioner, remembering his fancied successes with other cases, is emboldened to pursue his medicinal measures until confronted by some complication which forces him to call in surgical aid, or until death brings to an abrupt and dismal end his roseate visions of therapeutic triumphs. Oftentimes the physician is deceived at the outset, or lulled into a sense of fancied security, by the mildness of the symptoms in the inception of an attack, forgetting or losing sight of the fact that, like the wind which "bloweth where it listeth" and no man can tell whence it came nor whither it goeth, so, also, the man does

not live who can tell at the outset of an attack how grave a course it will run or what will be its termination. If the case should progress to a satisfactory recovery, the unfortunate possessor of a crippled appendix has before him the stormy path of of subsequent attacks or the rough road of chronic invalidism, both of which lead to the surgeon in the end, after insult has been added to injury in the shape of adhesions, impaired vitality, etc., and which render operation more difficult and decrease the likelihood of absolute freedom from after effects.

Another potent reason for delay, and one fraught with danger, has widely prevailed owing to the influence of surgical teaching, which has laid down the dictum that cases not operated upon within the first forty-eight hours had best be let alone until a much later period, when nature shall have thrown around the affected area her protecting barrier and marshaled her forces for the fight. I say that this *has* been the surgical teaching, and is yet to a large extent and there are surgeons who will throw up their hands in holy horror at the idea of invading an abdomen on the third or fourth day in the presence of an acute inflammation. To them it is a "*Noli me tangere*," in which the patient must fight for himself, alone and unaided, the battle against the invading hordes of bacteria, which would beat a hasty retreat were an avenue of escape open to them. Following the brilliant work of Fowler and Murphy in peritonitis, we learned to realize more than ever, and the lesson has been fully impressed upon us, that it is pus under pressure, or bacterial action under pressure, that nearly always accounts for its wide spread and consequent absorption and toxæmia; that where free drainage is made, with ample opportunity for the escape of the inflammatory products, coupled with postural and other appropriate treatment, the tendency is for these toxic agents to follow the lines of least resistance, thereby escaping from the peritoneal cavity and limiting the extent of the inflammatory process, so that where a providentially disposed nature has failed of accomplishment in her efforts at building up an impregnable defense, surgical intervention is more urgently demanded than ever, no matter what the stage of the disease may be.

It is said that "Experience is a dear teacher," and it has been experience that has taught me that the longer operation is delayed the greater will be your mortality. This lesson was early impressed upon me and my views in accordance with this idea were set forth as long as six years ago in a paper read be-

fore one of our local medical societies. At that time, my position was regarded as extreme, but, in the light of our modern methods of dealing with acute abdominal affections, I am glad to say that the advanced surgical thought of to-day has demonstrated its correctness. There has been a tendency to overlook the fact that, leaving aside the more obvious complications of appendicitis, the appendix itself and surrounding tissues offer an open atrium for systemic invasion; too much stress has been laid upon the purely local features of the disease and too little regard shown for the profound constitutional manifestations which, after all, constitute the real danger, therefore, if one follows this train of thought he can readily see why so simple a procedure as the evacuation of an appendiceal abscess at a very late date, when the patient's resisting and recuperative powers are at their lowest ebb, will often result fatally. Had such a case received proper treatment at an earlier period, no matter what the local conditions might have been, his chances of recovery would have been greater in direct proportion to the length of time that had elapsed.

The lesson that I wish to impress most foribly upon you, and one that I wish that I had the gift of language or the flow or oratory or the logic of cold-blooded fact and reason to make you see it as the surgeon sees it, is that where operation is contemplated, any delay adds its mite to the ever-descending scale of danger; that, as stated above, the danger from operation increases in direct proportion to the length of time intervening between the onset of an attack and the time of operation, and, above all, that cases operated on very early give practically no mortality at all. To the credit of surgeons in general, I may say that I have never seen a death from appendicitis where operation was undertaken within the first twenty-four hours and that their mortality is chargeable rather to the fault of someone else in the omission of availing themselves of their services at the proper time rather than to any errors of commission on their part.

I must ask the indulgence of this Association for having presented a paper on this subject which seeks to deal with the questions in a purely practical way and which has not touched upon any of its aspects from a theoretical or scientific standpoint. It avails but little to enter into a fruitless discussion as to the various theories concerning its etiology when questions of vital importance concerning its management are still unsettled. I have dealt with the subject from the point of view of

the surgeon alone, as the surgeon can see but his side of it, and have therefore purposely withheld any reference to medicinal measures, as I feel that there is no rational treatment of this kind and that we are deluding ourselves and our patients when we lean upon such slender support.

The time will come with us, as it has already come in our larger cities, when appendiceal attacks will be recognized as calling for the same prompt surgical treatment as does a strangulated hernia, obstructed bowel or other ailment which seriously menaces the life of the patient, and, when that day comes, we will find that many of our serious abdominal affections, which we have hitherto looked upon as clinical entities, will have largely ceased to play a part in our tables of mortality and have fallen into comparative oblivion.

*PLEURISY OF CHILDREN.

P. R. BROWN M.D.,
WEST POINT.

I will state at the beginning of this short paper that I propose to try and discuss a few salient facts pertaining to the management and treatment of this by no means rare disease in children, and in doing so I am going to plead guilty to having overlooked many cases in their incipiency.

There are two distinct forms of pleurisy usually seen: the dry and the moist. The latter form can again be divided into serous, sero-purulent, purulent and hemorrhagic. The last mentioned is rare; it is seen in traumatic conditions and occasionally when tuberculosis is present. I have seen two such cases following traumatism. Dry pleurisy usually follows exposure to cold, although it may follow as a secondary inflammation to the lung. However, we will not discuss its etiology or pathology, as a reference to any good work on pediatrics will give you that in full detail. We will first consider the diagnosis and pass on the treatment, two of the main essentials in the management of any disease. The disease is usually ushered in with high fever, which may reach 104 or 105° F. Cough is usually present; it is a short, hacking, irritating cough; always accompanied with pain; as a rule children cry during each coughing paroxysm. There is no expectoration. A friction sound or a fine crepitant rale is heard over the affected area. These are

*Prepared for the Mississippi State Medical Association.

symptoms present in the early stage, which is sufficient to lead us to at once institute treatment.

Our first step should be to render the little patient as comfortable as it is possible to do. Immobilize the pleura by fixation with adhesive straps; if the pain is very severe I make a practice of brushing over the surface with tincture of iodine, after which apply a hot poultice of antiphlogistine of sufficient thickness to act as a splint to the part for twelve or twenty-four hours, which is easily removed for an examination and for that reason it is preferable to strapping down the chest wall with adhesive bands. Of course we do not expect, nor do we often find any accumulation in the pleural cavity in these acute cases, more especially if the child is healthy and free from any strumous diathesis; on the other hand, if the child is not blessed with good ancestral stock, we may look out for such, as it is pretty sure to occur. Bacteriological findings have not demonstrated to us yet which microbic element is responsible for the production of these pleurisies. We have all seen pleurisy complicating tuberculosis and rheumatism in children and it matters not whether they are due to the streptococcus, staphylococcus, or whether this microbe gains entrance to the pleura from the lung by inhalation or through the skin or whether the tonsil is the means of entrance of the pathogenic bacteria causing this disease, it has not been definitely determined. Neither does it matter with the therapeutist in that it would not shape his course of procedure. One mistake most of us make is not providing these patients with an abundance of fresh air, which is just as essential as in pneumonia. I do not believe we have at our command a better therapeutic agent than iodide of ammonium or sodium given three or four times a day in two to six-grain doses with codeine, according to age, preceded of course, by repeated fractional doses of calomel until all the emunctories are thoroughly stimulated. I never hesitate to give morphine in sufficient doses, hypodermically, to relieve pain. We should not fail to examine our little patients every day relative to an accumulation in the pleural cavity, and if found, on exploration, to be present, which exploration can be done with an ordinary hypodermic syringe armed with a large size needle, do not fail to aspirate as you will be rewarded by seeing marked improvement, even if there is only a small effusion.

Before the effusion is marked and during its absorption, friction sounds are heard over the inflamed area. After the ef-

fusion is present there are no friction sounds. There is an absence of rales, distant bronchial breathing and flatness on percussion. These points are worth remembering, as aspiration should not be delayed; hence, as I have stated, the importance of being vigilant and on the lookout may cut short a long and tedious convalescence, or, as it were, reach down into the grave and pull out the little victim. We should not wait for all of the alarming symptoms to arise, dyspnea, cyanosis, etc., but proceed to do the operation at once and see to it that we get good drainage. Put your patient on constructive agents, coupled with all the easily assimilated nourishments you can get down them, and, if all ends well, you will be much gratified; if not, you will have the consciousness of having done your duty. Those of us who have been in the practice many years are aware of the fact that serous effusions found in a healthy child are usually absorbed. Still, even this being the case, I think it best to aspirate, and if you fail to find the liquid at first—which is sometimes the case—try again. This is most sure to happen with you in the encapsulated form where a small area is involved. The results, anatomic and functional, are the ultimate desiderata of our efforts, and the observance and carrying out of the foregoing rules will obtain to this end as near as it is possible to do so. The application of cystodiagnosis—cell diagnosis—upholds the view that most cases of primary pleurisy are tubercular. Even admitting that to be true, we should be very guarded in making an unfavorable prognosis since we have learned after so long a time that about eighty per cent. of all mankind have tuberculosis at some time during their childhood or adult life and a large per cent. recover without the knowledge of ever having had the disease.

In conclusion I will state that a system of light gymnastics or so-called pulmonary gymnastics should be instituted for these patients as soon as it is possible to do so as it will hasten convalescence and counteract a tendency to adhesions of the pleura and facilitate the restoration of the collapsed lungs.

As already mentioned, acute pleurisy is in a large proportion of cases a tuberculous affection and it is found that in many instances pleurisy is followed sooner or later by pulmonary tuberculosis.

Just here I wish to report a case of acute pleurisy in a child three years of age with apparent recovery which illustrates the tendency to inflamatory conditions of all mucous membrances in many cases.

Infective diseases whether acute or chronic represent a war carried on between the complex defensive forces of the body which are concerned in the production and maintainance of what is called immunity against the invading micro-organism or micro-organisms.

This child showed a weak defensive force and resistance to the invasion of the different micro-organism or micro-organisms.

On January 7th. 1913 I was called to this child and found it with high temperature and very restless, manifesting some subjective signs of middle ear trouble, temperature running along from 100° to 103° F. for several days until I became convinced that I had a suppurative otitis media to deal with. Needing assistance as well as consultation I had my friend and colleague Dr. L. W. Dotson to see the patient with me and it was apparent that we had a double paracentesis to do, which we did and by keeping up thorough drainage the child made an uneventful recovery, but within eight or ten weeks developed a pleurisy, no doubt from the invasion of the same micro-organism which gave rise to the middle ear trouble. Frequently much good can be done in this type of cases, especially where there is a sub-acute or chronic empyema by cultivating the principal organism or organisms in these discharges and vaccinating the patient with them.

Statistics show that more than one-third of all cases of empyema occur in children under five years of age.

Hence the attending physician should put forth his very best efforts to relieve them in the early stage.

*CALCIUM SULPHIDE.

H. C. BUCK M.D.,
FRIARS POINT.

In this age of progress when we have antitoxins and vaccines for nearly every human ill, it may be presumptious, and decidedly out-of-date for one to call attention to a remedy that is nearly as old as the profession of medicine, but I believe in the old adage "Prove all things! hold fast to that which is good." I believe also that this old "saw" can be more fittingly applied to materia medica and therapeutics than any other one thing. Hence, while I know very many of the new remedies now in use are very good, I also know there are many old remedies, even some of those that have been relegated to the "scrap

*Read before the Clarksdale and Six Counties Medical Society.

pile" or "Oslerized," that deserve a place in modern medicine. Experience and observation have taught me that many of these remedies, when used properly and intelligently, are as good, or better, than some of the newer ones; therefore, I believe we should thoroughly test and prove our remedies, and hold fast to those that stand the test, be they old or new. I am also aware of the fact that, because a remedy proves good in one or two cases, it does not prove the remedy a "sure cure" in all such cases. Still, I think, if it proves good in one or two cases, we should at least give it a trial in other cases of a similar nature. Therefore, I wish to call your attention to a few experiences I have had with calcium sulphide, as a prophylaxis in some contagious diseases and other conditions.

A few years ago I was called to the country to see a negro. I found a well-developed case of smallpox, the patient and adult. I 'phoned the county health officer and reported the case. As it was during the winter, and the roads were in very bad condition, the health officer asked me to look after the case for him. I knew it would be several days before I could procure any vaccine virus and, before I could do so, the whole family would probably be sick with the disease, so I determined to try calcium sulphide. I visited the family the day after my first visit; there were seven persons in the family, including the sick man, all adults. I gave each of the well persons one grain of calcium sulphide every two hours the first day, and one every four hours during the day for a week; to the sick man I gave two grains every two hours the first day. When I first saw the man the pustules were beginning to form; on my second visit, and when I began the calcium sulphide, the pustules were beginning to "pit"; on my third visit, and after he had been taking the medicine for twenty-four hours, I found the disease arrested; all the pustules seemingly drying up. The man improved rapidly, and recovered without further trouble. No other member of the family had the disease, although no other precautions or preventives were used.

A year or two after this experience we had an epidemic of measles in my territory. Remembering my experience with this remedy in smallpox, I resolved to try it in measles. In every case that I used it the disease was aborted or checked, and no one had the disease whose system was saturated with this remedy, regardless of the amount of exposure to contagion.

Some time after this I was called to a negro family in my town, consisting of a man, his wife, and three children, whose

ages were seven, five and three years. I found the oldest child —a girl—with a well-developed case of diphtheria. Membrane had formed on the fauces. I gave her a thorough purge of calomel and podophyllin, also a throat wash of saturated solution of chlorate potash and tincture of iron. I had some quarter (¼) grain calcium sulphide tablets; to the youngest child I gave one, to the next two, and to the oldest three tablets every two hours the first day, then every four hours for a week. On my second visit I found the membrane all gone out of the throat of the oldest child, just a little redness in the throat of the second, and no symptoms of the disease in the youngest. The disease made no further progress in either of the older children, both recovering, while the youngest escaped the disease entirely. These cases were in a negro cabin of one room, where the whole family lived, and with the most undesirable sanitary conditions.

During the winter of 1911 and 1912 we had an epidemic of whooping cough in my town, it is needless to say here that I tried, in treating the disease, all the remedies that are recommended by the authorities for the treatment of this disease. The remedy that gave me most satisfactory results was calcium sulphide. But I must admit I tried it in only two cases. The first was an infant, eight months old. As soon as the disease appeared, I put him on one-fourth (¼) grain of calcium sulphide every four hours during the day, and instructed the mother to keep his bowels open; this she did with "Castoria," although the child was teething, and cut four teeth during the time, he was only sick about two weeks, and lost one pound in weight. The second case was a frail little girl, about two years old. As soon as I learned she had been exposed to the disease, I put her on one-fourth (¼) grain calcium sulphide every four hours during the day. However, I first thoroughly unloaded the bowels with small doses of calomel and podophyllin. While the remedy did not prevent, nor cure the disease, and she had a moderate cough for four or five weeks, yet I feel sure it was beneficial as she never had a severe cough, and her general health was not impaired in the least. While, as I said, she had a severe cough, at no time did she have any paroxysms such as are usually seen in such cases.

I have a lady patron who suffers, as she expresses it, death from car sickness if she is on a train for more than five hours. She told me this, and said she had to make a trip of three or four days, and asked if I could possibly give her anything to

prevent the attack. I gave her some one-grain calcium sulphide tablets, instructed her to thoroughly unload the bowels, and begin the day before she started on her journey, and take one tablet every two hours during the day, and take one every three hours during the day until she reached her destination, to pursue the same course when she was ready to start home. She was gone several weeks. On her return she told me she did not have a symptom of car sickness while she was away.

I have seen no work on materia medica, or therapeutics, that mentions this remedy as an intestinal antiseptic, nor as a preventive of the diseases mentioned in this paper, yet, from my limited experience with the remedy, I think it possesses such properties in a marked degree, and should be given a thorough test.

*EPITHELIOMA OF OCULAR CONJUNCTIVA WITH PRESENTATION OF SPECIMEN AND PATIENT.

ROBERT FAGIN B.A. M.D.,
MEMPHIS, TENN.

Pathology teaches us that epitheliomas or epidermoid carcinomas, as they are sometimes called, always originate from squamous epithelium. At the same time we are told that by continued irritation, other types of epithelium or endothelium may be converted into the squamous and then be followed by an epithelioma. Thus we find them not only in the tissue derived from the epiblast such as skin, mouth, tongue, edges of nose, eyelids and cunjunctiva, but also in the tissues derived from the mesoblast and hypoblast: Example, the larnyx bronchi, œsophagus, stomach, gall-bladder, uterus, etc.

It is perhaps the mildest of all the malignant tumors yet if left undisturbed it will ulcerate and kill the patient, either from exhaustion or by metastasis. We are all familiar with this cancer. Perhaps each doctor present has had one or more patients suffering with this disease, so that the onset symptoms, growth, etc., will not be discussed. Suffiice it to say that this tumor seems to prefer to grow at the junction of skin and mucous membrane or at the junction of different kinds of epithelium. It may arise without discoverable cause or it may follow a wart or fissure, or prolonged irritation. Dennis says that all clinical evidence points strongly to the view that inflammatory changes following long continued irritation are

*Read before the Clarksdale and Six Counties Medical Society.

responsible for this cancer, and he points out the epithelioma of the lip caused from the hot stem of the pipe; the chimney sweep's cancer from soot in the scrotal folds and epithelioma of the gall-bladder caused by gall stones.

These cancers are never found before puberty and rarely found in middle age, but fairly common after the age of fifty. On the face, they seem to select the openings of either the mouth, nose or eyes. If the region of the eye is selected they are most commonly found at the outer or inner canthus just where the lids come together, or they select the upper or the lower lid and grow from the junction of the skin and the mucous membrane. Very rarely do we find the growth selecting the conjunctiva alone, if so it is always at the limbus. I have seen only two such cases.* One of these was in Fuch's Clinic in Vienna, and the other one in my private practice at my home in Memphis. Of the latter case I am very much pleased to show you the eye upon whose conjunctiva this cancer began, and am pleased to present to you Captain A. J. Rylee of Tutwiler, Miss., whose right eye had to be enucleated and I am gratified to say that his pain ceased at once and so far he has had no sign of a recurrence of this growth.

On August 26th, 1912 Captain Rylee came into my office complaining of a small growth on his right eye ball. For several years he had been suffering with a pterygium on this eye, and had planned more than once to have it removed. Now it seemed to him that it had taken on sudden growth, and was red and inflamed more than it should be. On examination we found his statements true. It was no longer a small growth and when it was viewed with a large magnifying glass, many small blood vessels were seen. Argyrol and the yellow oxide ointment were prescribed and for a month no visible change for the worse was noticed, but two months later the new formation no longer presented the appearance of a pterygium. It had extended partly over the cornea, but did not cover the pupil. With the corneal miscroscope many minute blood vessels were seen. On Oct. 25th, a small section of the growth was cut off at the corneo-scleral junction and sent to Dr. H. T. Books for microscopical examination. Two days later the following report came back from the laboratory:

Pathological Report on Tissue Sent to Laboratory Oct. 25th. 1912, By Dr. Fagin.

Specimen consisted of a piece of tissue removed from a growth at sclero-corneal junction of right eye. *Ficroscopic Ap-*

pearance:—Specimen was the size of a small pea, irregular and somewhat flattened. It was soft, succulent, and appeared quite vascular. Resembling in this respect granulation tissue. *Microscopic Appearance*:—Epithelial layer was definitely thickened. There was distinct and unmistakable infiltration of the deeper structures with squamous epithelium. Periphery of specimen showed dilatation of blood vessels.

Diagnosis—Epithelioma.

(Signed) H. T. BROOKS, Pathologist,
University of Tennessee, Pathological Department.

When this report came in, the patient at once consented to the enucleation and although the vision in this eye was still normal, 20-20, and this had always been his best eye yet he was willing to discard it in hopes that the disease might be permanently removed. The patient possibly would not have consented so readily, but for the fact that this was the third attempt for this kind of a tumor to grow on his face. Both of the other attacks were successfully removed, so he had hopes that this one might be removed also. The first attack was on the nose and the second on the cheek.

On November 1st. 1912 the enucleation was done and the patient made an uneventful recovery. Two months ago we had an artificial eye-maker make him an eye that would fit the socket without causing any irritation. He has been successfully wearing this eye ever since.

I present this case to you for the following reasons:

1. It is the more interesting because of the fact that this patient lives among you.

2. It shows us what can be done to relieve the patient, if the diagnosis and treatment are made in time.

3. That if an epithelium grows on the conjunctiva it always begins at the corneo-scleral junction and inflammatory products here predispose it.

4. It teaches us that pterygira should not be allowed to remain on the eyeball too long, lest, in old age they may become irritated and take on cancerous growth.

5. It plainly shows us that matters not where we practice or how far we may live in the country we are likely to find any of the diseases to which human nature is heir, and our mission is thoroughly fulfilled if we make every known effort to diagnose the condition and then as speedily as possible give the necessary treatmnt.

Current Literature

PITUITRIN IN OBSTETRICS.

Litzenberg, *Saint Paul Medical Journal*, reports thirty cases in which pituitrin was used and sums up as follows:

"Analyzing this series we find that pituitrin acted promptly in sixteen cases; slowly but satisfactorily in two cases and there was no effect in two cases; forceps was required in six cases. One version was required for the second of twins; in the other twin case the pituitrin acted promptly. There were stormy pains with tetanic contractions in one case; one child was asphyxiated but was resuscitated. There was one extensive laceration due to the violent pains produced. There was one moderately contracted pelvis in which forceps was not needed. The drug was given four times during the first stage, only once with satisfactory results. In the twenty-two cases in the second stage seventeen responded promptly.

"Pituitrin possesses the quality of a stimulant on all unstriped muscles. It seems to act best, however, on the uterus during labor. While it causes contraction of the uterus at all times it does not stimulate it sufficiently to act as an abortifacient, therefore it has no value in producing therapeutic abortions and we need have no fear that it will be used for criminal purposes. Even at full term the uterus does not seem to be particularly sensitive to the use of pituitrin, for only a few authors have been able to report success in inducing premature labor, although it does seem to act favorably in this class of cases occasionally.

"Although the uterus seems to be sensitive to the stimulation of pituitrin during labor, there certainly is a difference to its response during the three stages. In my own series, the pituitrin seemed to be of very little value during the first stage and this coincides with most of the authors. I believe that it is not efficacious during this stage not only because the uterus seems to be less sensitive to its action, but that the resistance has something to do with this and that there is danger in using it during this stage unless the cervix is entirely effaced and there is considerable dilatation of the cervix—preferably complete. There is no doubt that pituitrin seems to act better the nearer the stage of complete dilatation is approached. Therefore the best time to use it is during the second stage of labor.

"It is of some value during the third stage but is not more reliable, though quicker in its action than ergot. We are told that pituitrin is without danger and can be used at any time. I cannot agree with this dictum for there have been enough cases of post partum hemorrhage after its use to at least caution us against the belief that it prevents the post partum hemorrhage for it certainly does not always do so and we must exercise just as much watchfulness in order to prevent post partum hemorrhage after the use of pituitrin as we have been wont to do in the past.

"The reports have been so very favorable that enthusiasm has been almost uniformly expressed but now that a few unfavorable reports have come to us we must needs pause and remember that we really know little about the exact action of pituitrin and that it is yet in the experimental stage and much must be learned before pituitrin is given its definite place.

"If very stormy labors are occasionally produced by its use, if preciptate labor is sometimes the result, if lacerations of the cervix and perineum are sometimes unavoidable on account of the violent action of pituitrin, if tetanic contractions do occur and if rupture of the uterus happens in some cases, all these things may again happen to us. Therefore we must exercise caution and endeavor to select our cases so that this valuable medicament shall not fall into unjust disrepute.

Conclusions.

1. Pituitrin is a valuable stimulant to uterine contractions.
2. It will not usually produce an abortion.
3. It will sometimes induce premature labor but is not reliable for that purpose.
4. The results in the first stage of labor are not satisfactory unless the cervix is effaced and considerably dilated.
5. With an undilated cervix it is not to be recommended.
6. It is most efficacious during the second stage of labor.
7. It is of some value during the third stage but its efficacy is much less certain than in the second stage.
8. Post partum it is also of some value but not better than ergot.
9. I believe its proven value is limited to the second stage of labor.
10. Our knowledge is still limited and its use not without danger, so it must be used with caution.

SCHOOL HYGIENE.

An exhaustive investigation has been made into the health of pupils in the public schools, not only in the large cities, but also in rural districts, and in all parts of the country. Dr. Thomas H. Wood, Professor of Physical Education in the Teachers' College of Columbia University, sums up the findings as follows:

Out of the twenty million school children in the United States—

A million have flatfoot, spinal curvature, or other moderate deformities serious enough to interfere in some degree with health;

A million have defective hearing;

Five million have defects of vision;

Six million have adenoids or enlarged tonsils or cervical glands needing attention;

Ten million have defective teeth interfering with general health;

Five million suffer from malnutrition, in many cases due wholly or in part to some of the foregoing defects.

Many children suffer from two or more of the troubles named. In all, fifteen million children, three-fourths of the whole number, are in need of attention for physical defects which impair their present learning capacity and which are likely to develop into grave chronic afflictions or to render them abnormally susceptible to dangerous diseases in later years.

In a large proportion of the cases, these defects could have been avoided by proper precautions. In another very large proportion, they can be cured by proper attention. Every year that attention is delayed reduces the chance of cure and increases the life-long impairment of vitality.—*Southern Practitioner.*

"Minneapolis is the cleanest city it has been our privilege to visit. Whether the clean up was for the occasion we know not, but the city was really clean, backyards and alleys as well as front streets and lawns."—*New Mexico Medical Journal.*

This brings up the question—what was McBride doing prowling around in the alleys and backyards.

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SUBSCRIPTION ONE DOLLAR PER ANNUM.

It is impossible that we should pass without comment the loss of such a member as Dr. J. B. Bullitt who has severed his connection with the University of Mississippi to take up similar work in the University of North Carolina. He has been an active worker in the Association ever since coming to Mississippi and since 1907 has been a member of the Council. When Dr. Williams resigned from that body, on being chosen president of the Association in 1911, he was elected to its chairmanship. In 1908 he was one of the vice-presidents and in 1909 served as delegate to the A. M. A..

The above brief note gives a small idea of Dr. Bullitt's real service to the Association. His wide learning, his forceful manner in debate, his faithful stand for his high ideals, his gentle courtesy and broad charity will long be remembered by all. It has for some time been a matter of common opinion that the University would not be able to hold him very long, so his leaving is no surprise. We congratulate the University and the Medical Association of North Carolina on their acquisition.

The secretary of the State Board of Health has sent the following letter to our senators and congressmen:

August 12, 1913.

My Dear Sir:

The spread of pellagra in the south, and particularly in Mississippi is appalling. The following will show you the number of cases reported to this office by the various county health officers since January 1, 1913:

Cases of Pellagra.

	Total	Jan.	Feb.	Mar.	Apr.	May	June
State	1253	60	68	84	200	261	580
White	588	28	44	53	146	124	193
Negro	665	32	24	31	54	137	387

Pellagra Deaths.

	Total	Jan.	Feb.	Mar.	Apr.	May	June
State	267	21	21	24	34	75	92
White	74	7	8	7	10	24	18
Negro	193	14	13	17	24	51	74

This number is incomplete, as our health officers have not been able to get full reports from the doctors in their counties, but will serve to give an idea of the spread of this disease, especially when we consider the fact that in 1907 it was practically an unknown quantity in this country. The United States Public Health Service reports that the mortality from this disease is approximately fifty per cent.

The theory has been advanced that the disease is probably due to corn meal, or corn products made from spoiled corn. Whether this be correct or not, surely such products are unfit for human consumption, and their sale should be stopped. Practically all the corn used in this state comes from the Middle West, and much of it is spoiled, and unfit for food. It has been said that carload lots of corn have been shipped to this state to be used for food for stock, and being refused by the consignee, due to its damaged condition, and being unfit for stock food, it has been returned to same northern mill and ground into corn meal, and this meal, made from spoiled corn, is shipped back to us for food.

Knowing as you do, the extensive use of corn meal in this state, you can readily see that we are entitled to some protection against the sale of corn products which have been declared unfit for animal food. As this is an interstate matter, I feel that you can include the inspection of corn products under the Food and Drug Act, or take some action whereby we may be protected against the shipment of corn products in this state.

Trusting that you and your colleagues who have the interest of humanity at heart, may give this matter your careful attention, I am,

Very truly yours,

E. H. GALLOWAY,
Secretary and Executive Officer.

As the doctor very pertinently remarks, whether the disease be due to spoiled corn or not the sale of foodstuffs made from such material should be stopped, and to that end we venture the suggestion that our county societies put their shoulders to the wheel and call upon the lawmakers to consider Dr. Galloway's letter seriously. If each society will address letters to Senators Williams and Vardaman and to the representative from its territory, we will in all probability "start something." There are a good many of us who have pretty serious doubts about the etiology of pellagra but practically all observers agree that corn products feed the flame when once it is started —and nobody wants to eat rotten food anyway.

Mississippi State Medical Association.

CHANGES.

Dr. J. B. Bullitt, councilor of the second district and chairman of the council, having resigned, President Feemster has appointed Dr. A. L. Emerson of Hernando to take charge of the district and designated Dr. F. J. Underwood chairman of the council.

Dr. T. J. Brown of Grenada is appointed to succeed Dr. Bullitt as chairman of the section on physiology, pathology and bacteriology.

NEW MEMBERS.

Since the roll was made up for the Transactions the following have been added to the membership: R. T. Stapleton, recently of Deeson but now moved to Jacksonville, Fla.; C. Galloway, Mississippi City; W. R. Pope, Ethel; H. A. Portwood, ———; C. V. Gilmore, Hickory; W. J. Pennington, Decatur; J. R. Plummer, Hickory.

REMOVALS.

J. B. Bullitt from University to Chapel Hill, N. C.; J. N. Whittle from Union to Mineral Wells, Texas.

SCHOOL INSPECTION.

"An effort to secure proper medical inspection of the public schools in Jackson is to be made at once by the physicians who are members of the Hinds-Rankin County Medical Society, and a committee from that organization will meet with the city board of education next Monday to discuss the matter.

The committee was appointed at the regular meeting of the medical society in the apartments of the Jackson Board of Trade last night, after Dr. W. B. Dodson read a paper on "Medical Inspection Of Public Schools."

"The discussion of the subject was general, a number of those present growing enthusiastic in talking of the importance of the matter.

"The committee to go before the Board of Education is composed of Dr. J. P. Wall, chairman; Dr. E. H. Galloway, Dr. W. B. Dodson and Dr. R. S. Curry.

"The idea of the physicians is to have the city pay for the services of a medical inspector, and if this is done the doctors have decided to offer their services free to those who are unable to pay for them, in the treatment of children reported sick by the inspector, or for surgical operations where they are necessary.

"At the present time the inspection of children is by the teachers and the physicians contend that this method should be improved upon."—*Vicksburg Herald*, Aug 14th.

Acting on the suggestion of the committee on public policy and legislation, Mayor J. J. Hayes of Vicksburg appointed Drs. E. F. Howard, M. H. Bell, S. W. Johnston, I. C. Knox and J. S. Ewing to advise with the Board of Education regarding inspection of the public schools. Dr. Howard appeared before the Board and after a discussion of the subject it was agreed to leave the matter in the hands of Prof. J. P. Carr, superintendent of schools, who will, in the near future, call the teachers together to meet the committee of physicians and come to a definite decision in the matter.

Book Reviews.

COLLECTED PAPERS BY THE STAFF OF ST. MARY'S HOSPITAL (Mayo Clinic) for 1912. Octavo of 842 pages. 219 illustrations. Philadelphia and London: W. B. Saunders Company, 1913. Cloth, $5.50 net.

This collection of papers, the publication of which has became an annual event, while chiefly of interest to surgeons, contains a great many articles on subjects concerning which the practitioner of medicine must keep himself informed. There is no other work, with which the reviewer is familiar, so well suited to the medical man who does little or no surgery, but who perforce must keep at least an academic knowledge of the surgical side of his profession. Probably of the greatest interest are the various articles on goiter, a condition becoming more generally found through this section and with which the Mayos have had vast experience.

E. F. HOWARD.

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*A FEW REMARKS ON HYPERTENSION.

SHELBY C. SPENCER B.Sc., M.D.,
SHANNON.

After hearing the brilliant papers of our distinguished colleagues, Doctors McCowan, Fontain and Boswell, I fear this poor effort of mine shall appear sadly out of place, nevertheless our physiologies teach of well balanced rations, you have received your proteids, carbohydrates and fats in correct proportion and that they be properly digested and wholly assimilated a diluent is indicated, therefore kindly regard the superficial remarks you hear from me as a diluent or filler.

In choosing this condition, hypertension, as a subject for a paper, I did so bearing in mind that it might promote sufficient discussion of a pedagogic nature to enlighten me on some points not made clear by books and journals.

Like most of you some time ago I purchased one of those overrated instruments of precision, a sphygmomanometer, said to be of incalculable value to the general practitioner. I say overrated advisedly, overrated as have been the bacterial vaccines, the phylacogens, Friedman's cure for tuberculosis, Bannerman's solution, the Morro and Von Pirquet reactions for tuberculosis, the new drugs, such as diarodin, atoxyl, atophan, and salvarsan, of ephemeral popularity, foisted on the general practitioner by the manufacturer for an enormous profit through their versatile representatives and the wonderful case reports of their well-managed advertising bureaus, nevertheless these agents have a great value, even though they have by far fallen short of the results at first claimed and for that reason, and because they are a step onward, deservse our commendation.

According to the authorities that I have consulted the term hypertension is applied to a condition of blood pressure where the tension persists above the estimated normal. This condition is a symptom of prominence in many diseases, it is most

*Read before the East Mississippi Four County Medical Society.

generally found in arterio-schlerosis and chronic nephritis and is also present in acute nephritis, uremia, eclampsia, valvular heart lesions, angina pectoris, myocardial degenartion, some psychoses, gout, lead poisoning, and intoxications from various causes.

I hardly think it out of place to add that other findings equally prominent and by far more diagnostic are discovered by careful use of the stethoscope, the microscope, the urinometer and a little nitric acid.

I consider the sphygmomanometer of greater value in the treatment of these troubles than as a diagnostic agent. By it we are enabled to gauge our dosage and should such information be necessary are warned when to stop our dosing. It also shows the reliability of our therapeutic agents by telling when a firm has made an erroneous statement about it's supposedly potent drug being assayed and physiologically tested, especially is this deceit marked when by changing to rival concerns' products the desired result is shown. Were it not for this apparatus we would be comparatively in the dark, however careful our clinical examination might have been and would probably doubt the diagnosis before questioning the action of the drug.

In taking blood pressure we of course take into consideration the temporary fluctuations due to trivial things not of pathologic nature and we should also bear in mind that a hypertension without some accompanying discernible pathologic lesion or result of such lesion is no excuse for drug administration, to lower such lesion by active medication is therapeutic meddling and displays lack of reading on the subject.

In my estimation a systolic pressure of 160 to 170 M. M. is normal and necessary to the comfort of some individuals between the ages of sixty and seventy. In people of this age it is possible and more certain than probable that there be some circulatory degeneration, a sclerotic kidney glomerule, a hardened edge of a heart valve, a pipe steam peripheral artery, with concomitant hypertension, there being no subjective symptoms, the patient consulting us for some other ailment of perhaps minor character, and soon is discharged unless the hypertension is lowered, then the patient becomes a bore, or a bonanza, this being dependent on the victim's financial condition.

I have just dismissed a case with the following history: white, age sixty-seven, widow. Family history, as to circula-

tory diseases, negative. Personal history: up until one year ago, health was remarkably good. Present illness began one year ago immediately after death of husband from organic heart lesion, patient having nursed husband through an illness of six months duration, losing sleep and eating irregularly. After death of husband her attention being directed to herself she went to bed hoping and presuming that she had an organic heart lesion. One of my colleagues was called in, a physician from a neighboring village invited as consultant, who discovered her systolic blood pressure to be 165 M.M. without any accompanying lesion. Regardless of this, patient was later put on active medication for arteriosclerosis and its hypertension. This treatment was kept up intermittently for six months. Patient steadily declined, said "that potash gave me indigestion"; becoming dissatisfied with the regular profession took unto herself a Christian scientist. The disciple of this powerful sect being equally unsatisfactory to finish the anti-climax, I was requested to take the case.

Patient was found in bed; temperature normal, pulse weak and rapid, mucus membranes pale, systolic blood pressure 130 M. M. With the exception of Riggs' disease and gastric indigestion, nothing else of pathologic nature was found on careful examination and six days observation. At the end of that time patient was put on hematinics; Dr. Gurney's favorite Bland's mass was in this instance used, and blood pressure agents in the form of forced feeding and a reliable preparation of nux vomica. As blood pressure arose patient improved and when 170 was reached patient was discharged. Since that time she has undergone a mild attack of bronchitis without any disastrous result and to-day is doing well with a pressure of about 165 M. M.

*TUBERCULOSIS CAN BE CURED.

F. E. LEE M.D.,
ABERDEEN.

Tuberculosis is due primarily to the presence and mutiplication in the body of Koch's bacillus tuberculosis.

Its characteristic phenomena are provoked by two endotoxines which the dead body of this bacillus liberates, first a poison of unknown identity which depresses directly the test organ and through it theadrenal system, thus inhibiting the

*Read before the East Mississippi Four County Medical Society.

protective functions of this system. Second a nucleo-proteid rich in prosphorns which when in contact with pulmonary or other living tissnes abstracts their oxygen, thus forming areas of necrosis.

The early signs nsually described are those of a fully developed case, and herein lies one of the causes of so many failnres in the treatment of this much dreaded disease.

Tuberculosis is divided into three stages: the incipient or first stage is due to lowered nutrition of the body at large as shown by a more or less rapid emaciation, general weakness, pallor of the skin, a tendency to hypothermia, cold extremities, and a sensitiveness to cold especially noticeable in children. Pulse from ten to twenty beats higher than normal, lowered blood pressnre, passive sweating, mnscular atrophy, drooping of the shoulders with diminished expansion especially marked in the infraclavicular space, and abnormal projection of the scapula.

The emaciation, weakness, anaemia and pallor are familiar symptoms owing to their persistence throughout the disease; therefore the most important featnre is to detect them before the onset of the pulmonary lesions. The incipient stage is one of fnnctional depression. The rapid pulse or tachycardia, a sign to which many able clinicians inclnding Potaine, Layden, Cornet and Loomis attach great importance, is a constant accompaniment of low blood pressnre, the two phenomena being related through a nervous mechanism, and is nature's effort to supply the lungs with the normal amount of blood and as the volnme of blood is reduced, cardiac pulsations are reflexly increased to compensate for the reduction in volnme.

The second stage becomes clearly defined when the deposit of tubercles is snfficiently great to modify the normal sonnds obtained from the chest by auscultation and percnssion; when snfficient area is involved reliable physical signs may be detected on auscultation immediately below the clavicle, above it and posteriorly over the supraspinous fossa; namely: roughness of the inspiartory murmur, coupled with a lowering of the pitch, and when the respiratory field is greatly redneed in the area examined, muffling of the vesicular murmur with blowing or prolonged expiration. These modifications of the sonnds are due mainly to the reduction of the caliber of the broncioles and of the secondary air passages in the cavity of the alveoli by the tubercles.

Dyspnœa, an increase in the respiratory rate, cough, fever, hemorrhage and lassitude more pronounced, are general symptoms of this stage.

In the third stage, that of softening of the tubercles and cavity formation, areas of caseation in the lung tissues varying from the size of a pea to that of a lobe or even the entire lung, are formed when the necrotic process is too rapid to permit the formation of the fibrin net-work or outer zone, which the miliary tubercle incloses the necrotic tissues and the disengaged bacteria. Hemorrhages in this stage being due to the erosion of larger vessels, are more numerous and more dangerous than in the earlier stages, the fever likewise is of a different type, being higher and of a more septic type, which it really is, being due to the absorption of the toxines into the system.

That tubercule bacilli are pathogenic owing to their phosphorus, is shown by the similarity of their effects to those of chronic phosphorus poison. Phosphorus, as is well known, arrests local nutrition. Carr and others found that this was due to oxidation of the element. Araki showed that lack of oxygen was a prominent feature in phosphorus poison. The coagulation necrosis caused by the tubercle bacillus is a counterpart of that caused by phosphorus. As to the anemia and diminution of red blood corpuscles and hæmoglobin, Vogle and others have recorded similar effects in phosphorus poisoning. The low blood pressure and rapid heart beats are likewise present in phosphorus poisoning. It is a well known fact that the formation of the tubercle requires the death of the bacilli, thus liberating their principle constituent, phosphorus. This element, owing to its intense affinity for oxygen, becomes oxidized at the expense of what adrenoxidose may be present, but when this source fails, it takes up that of the underlying cellular elements and provokes a local coagulation necrosis. Does not this give us a clearer insight as to the treatment of tuberculosis? We contend that it does. Before taking up the treatment, it might be well to consider the differential diagnosis between tuberculosis and syphilis of the lung, the one disease which is most likely to cause an error in diagnosis to be made. Dieulafoy divides syphilis of the lung into six types or forms as follows: first type pulmonary syphiloma with acute febrile course simulating acute tuberculosis or tubercular broncho-pneumonia; second type, pulmonary syphiloma of slow course, simulating ordinary chronic tuberculosis in the stage of cavity; third type, broncho-pulmonary syphiloma with fibrosis or

sclero-gummattous lesions simulating chronic pneumonia and cirrhosis of the lung with or without bronchial dilitation, pleurisy and tracheo-bronchial adenopathy; fourth type, syphilitic gangrene of the lung; fifth type, syphilitic pneumopathy complicated by pulmonary tuberculosis; sixth type, hereditary pulmonary syphilis.

The prognosis depends upon several things, namely: age, occupaiton, sex, habits, residence, stage of the disease and temperature. Dieulafoy says that fever in tuberculosis is of the greatest importance as it is almost a certain index as febrile tuberculosis is always grave and in a majority of cases indicates a mixed infection, while the non-febrile form may go on for an indefinite period without compromising life.

The successful treatment of tuberculosis depends upon two things: first, a correct diagnosis; second: that the diagnosis be made in the stage of incipiency long before the tubercle bacilli can be demonstrated by the miscroscope and to confirm this opinion I wish to quote verbatim from a paper on tuberculosis read before the State Medical Association by Dr. Hightower, of Hattiesburg. This is a report of seven cases seen by Dr. Hightower while an interne in the Naval Hospital in New York. He says one day seven patients walked into the hospital, the diagnosis in each case being pulmonary tuberculosis. They were heavy, strong and healthy on superficial examintion, having more the appearance of a baseball team than that of a group of patients, so much so that they were the joke of the hospital. They had been diagnosed by a surgeon of one of the ships who had had extensive experience with tuberculosis in the Naval Hospital for Consumption in Colorado. He was indeed an expert. He had made his diagnosis mainly by means of the most delicate of physical examinations; the symptoms were very slight and would usually be overlooked.

The instructions of the medical director were to make the most exhaustive search for the tubercle bacilli in the sputum of each case. It seemed to be the general opinion that this expert was (to use a slang expression) "hipped" on the subject of tuberculosis and they were determined to find out if there were any grounds for his many diagnoses of the disease. The sputum of all seven cases was examined every day for two weeks; during the first four days the bacilli were found in only one specimen. At the end of two weeks they had been found in four cases. The three remaining specimens were sent to Washington where the bacilli were found in two of them.

So finally, six of the seven patients were sent to Colorado for treatment.

The treatment for tuberculosis is both hygienic and medicinal. The patient must be taught how to eat, to sleep, to drink, to breath, to walk and to live. In fact, a complete change in the great majority of cases must be made in their manner of living. Of the numerous drugs that have been tried, only one has stood the test of time, namely: iodine. Beechwood creosote has proven a failure as a curative agent. Crotalin has been found of marked benefit in the first stages of tuberculosis but is contra-indicated in the latter stages—strychnine is useful in all stages, but the drugs that will bring about a cure if begun in the incipient stage are: iodine, strychnine and magnesium sulphate. Not alone will they do their work, but the hygenic measures must be rigidly carried out. If this is done every case of tuberculosis diagnosed in the incipient stage, cannot only be arrested in its course, but a full and complete cure can be had in every case. A majority of cases seen in the second stage can be cured, and ease and comfort rendered in the third stage.

TREATMENT OF OPIUM ADDICTION.

JOHN W. STEVENS M.D.,
Physician in Charge City View Sanitarium,
NASHVILLE, TENN.

Opium or morphine addiction, which is one and the same thing, is a disease in the sence that the regular use of the drug begets a pathological state of the nervous system which necessitates the continuance of its use, whether the individual wishes to or not. Its unfortunate victim, therefore, is not to be looked upon with the contempt merited by the mere gratification of a vicious appetite, but, on the contrary, as a sick man worthy of our best endeavors in his behalf. The condition is so very common that I believe a few words concerning its treatment will not be without interest.

Addicts of this drug, as well as others, may be roughly grouped into two classes: first, the constitutional degenerate who takes up this habit as a result of his inherent nervous instability and demand upon the part of his nervous system for some artificial stimulation to enable him to meet the strain and stress of life. Second, those who acquire the habit more or less

accidentally, as it were. Into the latter group fall those who begin the use of the drug, perhaps without their own knowledge, for the relief of pain or some other physical distress, upon medical advice. No sharp line of demarcation can be drawn between these two classes, for they insensibly shade the one into the other; and, indeed, both factors may have been at work in the individual case. The thought of such a classification is, however, not unworthy of attention, and we should remember the greater danger of the acquisition of this habit on the part of neurotics and exercise a correspondingly greater caution in giving the drug to them. Unfortunately, it cannot be denied that the physician is only too often the cause of the habit, because of his injudicious administration of the drug. Familiarity with its unhappy possibilities, too, does not act as a deterrent to its use, and we find amongst physicians, dentists, druggists and their families more victims than amongst any other class of people.

The treatment of this condition has been associated with more of fakery and fraud than any other within the whole range of medicine. The daily press teems with advertisements from medical institutions promising and guaranteeing cure of the habit within two or three weeks, or indeed by some sort of home treatment. Any promise of cure outside of an institution is in most instances, the rankest nonsense, and practically all of the so-called home cures are merely so many bottles of morphine or codeine solution for which an enormous price is charged and whose use leaves the patient right where he began. The slavery of this habit is essentially one from which the individual cannot free himself unaided, and one whose insistence is so determined that it is beyond the power of human will to resist. These cases cannot therefore be successfully treated at all except under such supervision and control as will make it impossible for the patient to obtain the drug. To attain this, it is practically always necessary that he be in a properly regulated hospital. The withdrawal of the drug, too, from one who has used it in any considerable quantity, or for any great length of time, is not a simple matter nor one to be lightly undertaken. The more often I do this, the more profound becomes my respect for the potentialities involved, and no case should ever be treated except under close and skilled medical and nursing supervision. Except in the aged and infirm, or those in a very depleted physical state, untoward results will rarely occur. The prolonged use ofthe drug of course clogs up

the bowels and greatly interferes with normal metabolism. This throws more than a normal amount of work upon the kidneys in the effort to remove the effete material from the system with degenerative changes in these organs, and, for some reason which I am not prepared to explain, the withdrawal of the drug, perhaps through its coincident shock, sometimes results in uræmic manifestation. The frequent and systematic examination of the urine, in a large number of these cases, has revealed to me the fact that albumenuria and casts is not a very infrequent occurrence after rapid withdrawal of the drug. Collapse from the lack of the accustomed stimulation of the drug is mentioned by the authorities as something to be closely guarded against, but in my experience this has been something that has rarely given any trouble.

Treatment divides itself into two steps: that of withdrawal, and that of the after care and treatment. The first of these may be accomplished by one of two procedures, namely that of the gradual reduction of the daily dosage of the drug until its administration is entirely stopped; or second by that which we speak of as the active treatment. The first of these is not often employed because of its tediousness and the fact that it tends to beget a state of invalidism almost as hard to overcome as the drug habit. Its details are simple, being merely as above indicated, that of the gradual diminution of the quantity given until the patient reaches the point when its use can be entirely stopped. After the quantity has been considerably reduced, it will be necessary to give various other sedatives and hynotics which, in turn, are to be gradually withdrawn until the nervous equilibrium is re-established. This of course requires several weeks and is tedious both to the patient and physician.

The active method is the one to which resort is most often had. The essential features of this are very active elimination through the bowels and kidneys, the former being accomplished by purgatives, and the latter by the drinking of large quantities of water; the other step being the use of hyoscine in such quantities as to keep the patient relaxed and, generally, mildly delirious from thirty-six to forty-eight hours. As some one has well said, hyoscine bears the same relationship to the treatment of morphinism as does ether or chloroform to surgery, it serving as an anæsthetic to tide the patient over the period of nervous protest against the withdrawal of the drug. In its moderate use in this connection, hyoscine is quite safe, and I have never met with any untoward results. It is of course a potent drug,

however, and must not be used carelessly. It is not possible to withdraw opium or morphine from the addict without some discomfort and distress. Apparently the pain incident to withdrawal is due to the effect of some retained chemical product ordinarily kept bound by the opium alkaloids, and, therefore, the more free is the elimination, the less is the pain experienced. In the case of those who use laudanum, paregoric or gum opium, I have found it more satisfactory to substitute morphine given hypodermically which is generally very easy of accomplishment.

As a preliminary to the active treatment to be outlined in a moment, it is my custom to purge these patients freely for several days beforehand and to require them then, and throughout the active treatment, to drink large quantities of water at frequent intervals. In the case of those taking large quantities of the drug, I believe it wise, too, to spend some time before the final active treatment of withdraw, in gradually reducing the daily quantity consumed to as low a point as may be done without making the patient too uncomfortable. All cases of course cannot be treated exactly alike, but in a general way the following routine is followed: at bed-time five grains of calomel, one and one-half grains podophyllin and one-thirtieth grain of strychnine are given in one dose and the customary dose of morphine, after which the patient is put to bed for the night. The next morning, unless the bowels are already moving very freely, a dose of epsom salts is given before breakfast. At seven a. m. one-sixth of the total daily dosage of morphine is given hypodermically and this repeated at seven-thirty and eight a. m. At noon one two-hundreth of a grain of hyoscine is given hypodermically and this repeated every three hours until one a. m. of that night, when one-third of the daily quantity of morphine is given hypodermically. Five hours later the hyoscine in doses of one one-hundreth grain every three hours is resumed and continued throughout the remainder of the active treatment. This customarily establishes by this time a state of mild delirium which is desirable, the hyoscine being given therafter in such doses as to maintain this at a point short of excitement. In the meanwhile, from the time that the first dose of morphine was given at seven a. m. to the first day, one-sixtieth of a grain of strychnine is given every three hours throughout the active tratment. Also twenty-four hours after the dose of calomel mentioned, four compound cathartic pills are given, and these or cascara compound tablets are twice repeated at intervals of

four to six hours. This carries the patient up to a point fifty-two hours afteh dose of calomel, at which time one of two ounces of castor oil are given. Following the action of this oil, the patient feels much relaxed and considerably more comfortable than previonsly. This customarily marks the end of the active treatment, though the administration of occasional doses of hyoscine, during the next twenty-four hours, may ben necessary. One-sixth of a grain of strychnine, too, is given hypodermically every three hours for two or three days more. It is rarely necessary to give any morphine, after the last dose above indicated, but occasionally I have given a small dose in the late afternoon following the end of the active treatment. After this, however, the patient's condition and comfort are such that no further opiat is required. Hypnotics at bed time, and, perhaps, a systematic use of the bromides may be required for several days, after which the patient's condition is such that all of these things may be withdrawn.

The after treatment, from this time, consists of tonics, an abundant, nutritious diet, hot baths and other forms of hydrotherapy to produce sleep and a due supervision over the individual to prevent any return to the habit.

The prognosis is closely involved in this matter of supervision, the duration of which must vary with different individuals. Some are quite safe to be discharged in two or three weeks after the withdrawal of the drug, whereas others require a much longer after-care. It is not safe to advise any patient to remain in a hospital less than a month after the completion of the withdrawal, and ofttimes a considerably longer time would be wise. So accustomed has the public become to reading advertisements promising a cure of this habit in two or three weeks, however, that it is almost impossible to induce patients to remain longer than a month, which is not one of the least evils following that sort of advertising. This is one of the great handicaps to the ethical man who is conscientiously trying to obtain the best results in this line of work. It is not possible to tell what percentage of cases remain permanently abstinent after treatment. We lose sight of most of them, and a relapse is something that the patient does not tend to report. The number that go back to the habit is large of course, but, on the other hand, there are a great many who remain permanently cured, the hope of which justifies an effort in all suitable cases and the accomplishment of which is a sufficient reward for our best endeavors.

Current Literature.

Dr. F. W. Owen of Morriston, N. J., in discussing "The Social Side Of Syphilis," said that "from the first year to the fifteenth year, when the son is under the influence of a truly Christian mother, nine hundred and ninety-nine times out of a thousand there is no social disease. From the twenty-fifth year, if a man is under the influence of a Christian wife, not a weak Christian wife, but a strong one, his human nature is the same, but nine hundred and ninety-nine times out of a thousand he controls it. Now, if a man marries in his twentieth year he has only about five years of dangerous gap to pass, but he is frequently about the fifteenth year sent off to some institution where he meets with those who lure him from the path of virtue. I would have a family physician faithful to warn those families who were going to send a son off to boarding school and to advise against it. I tell you, after forty years of experience, that in families where the sons have been constantly under the influence of a Christian mother it is almost impossible to find one who is a victim of this evil and the more appealing forms of the social evil. The true protection is in the home. Now, in the city of Paris, one of the worst cities from that point of view that you or I know anything about, they have what they call the Bourgeoise—i. e., they have the careful, moral middle class, and it was my observation when studying there that my fellow-students who belonged to the Bourgeoise were steady, and those who belonged to the aristocracy and poorer class were in much greater percentage of the reverse of it; therefore, I place this proposition before this society, that the best thing for the young man is to get his education, and, at least his breakfasts and suppers where his mother is, and then he would have a great deal more chance to remain what he should be. We know human nature is the same. It makes a vast difference about the kind of influence you are under, a vast difference. Up to twelve the son follows the mother; after twelve the father, and fathers should fully feel their share of this responsibility."

The matter with the medical profession is that the doctor is a private tradesman engaged in a competitive business for profit. He should be a public servant. His importance to the people and the value, to the nation, of their physical well-being demand it, and some day will receive it.—*Penn. Med. Journal.*

MISSISSIPPI MEDICAL MONTHLY.

E. F. HOWARD B.S., M.D., Editor and Publisher.

S. MYERS M.D., Business Manager.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

The question of "lodge practice" is now up for decision in New York, it having been referred to the State Medical Association by one of its component societies. The particular cases in point are those of three physicians who on applying for membership in the component society were "recognized as what are popularly known as "ten-cent Doctors," *i. e.*, doctors who agree to render medical service to members of an organization on the basis of a monthly charge of ten cents per capita. The Board of Censors requested a personal interview for the purpose of persuading the applicants to abandon their contract work.

"One responded in person, the other two by letters. The former created a very favorable impression. He stated that circumstances compelled him, against his inclination, to act as he did. He further volunteered some interesting information concerning other sources of revenue from this form of practice, such as resulted from selling to the patients medicinal tablets, from opportunities gained through acquaintance of securing new patients who were not members of the organization for which he worked under contract, from the privilege of making his own charge for obstetric cases, and from the possibility of establishing a reputation which in time might permit him to practice independently.

"The letters of the other two candidates were practically identical in phraseology. They demanded to know why their election to membership was held up for three months, maintaining that there was nothing unethical in their conduct, that they would continue in the future as in the past to practise their calling at their own discretion, that if their manner of practising their profession was a cause for discussion or discrimination against them they desired to withdraw their applications, pertinently asking the question why they had been so persistently solicited for five years by the membership committee of the society to become members, and then after yielding to the request, to be compelled to suffer the indignity of a rejection."

The censors asked for further time and requested advice

from the Council. The Council couldn't rule against the applicants since a number of the members of the state organization pursue the same method, and so the matter is referred to that organization itself.

The *New York State Journal of Medicine* comments on the situation as follows:

"The matter is of importance because it opens up the question of lodge practice and the eligibility of this class of physicians to membership in the constituent count societies. It would seem a logical assumption that the unfortunate 'ten cent' doctor is in practically the same category as the ten-thousand-dollar-a-year doctor employed by the large insurance companies or the large number in the intermediate gradations, upward or downward as you choose, practising medicine under contract upon a collective group of individuals—civic, industrial, economic, etc. A possible reason for undesirability for membership might lie in the belief that lodge doctors have not the time to devote to the proper examination and care of their numerous patients, which condition might lead to malpractice suits which the state society would be compelled to defend unless the lodge or employing organization could be held responsible. As a matter of fact, under any such contention it may safely be stated that there are doctors in good standing in their respective county societies who have such a large private clientele that they cannot possibly give to their patients any greater degree of scientific skill.

"It it to be hoped that the matter may definitely decided by this appeal to the medical society of the State of New York. While an adverse decision would prevent the admission of a small number it would not be retroactive in its effect and deprive those present members who are engaged in this line of practice from the privileges of membership. It is the opinion of the writer that unless it is in conflict with established ethics, should there be no other adequate cause for rejection, lodge doctors should be considered eligible for membership."

This is a puzzle that always exists in large cities and occasionally crops out in small towns. From the standpoint of ethics, purely as an academic proposition it is difficult to see how the New York organization is going to be able to decide against these applicants. As the *Journal* well puts it, all contract work is in the same category and there should be no discrimination. It is simply a business proposition and it is up to the man making the contract to decide whether or not it is good business.

Personally the writer doubts the possibility of a man doing the amount of work necessary for a livelihood—with fees of this size— to have time to do really good work and thereby establish a "reputation which in time might permit him to practice independently." On the other hand, a year or two in this work, for the recent gradnate, who cannot obtain a hospital internship, might be the means of giving experience that, *in another location*, might put him on his feet more promptly than other methods. Experience and reputation do not necessarily go hand-in-hand. While it is true that the patient of the "ten-cent

doctor" is apt to get only ten cents' worth of attention, this is far more apt to be true in the case of a physician who has been at this kind of work for years than where he is only in it for a year or so for the experience. This should be taken into consideration.

The ethics of the patient, also, need consideration. Might it not be the case that a man could afford low-rate contract service when he could not pay the regular fees? And is it not better for him and the community, that he should pay what he can afford than go through life employing first one doctor and then another and never paying any of them?

Again—most physicians who pride themselves on being ethical in the matter of fees attend some families in poor circumstances without charge. These people could pay a modest fee but the opulent, ethical practitioner whom they employ will not "cut rates," and so solves his conscience by making no charge. A little co-operation in the profession would speedily remedy this.

If the New York Association declines to receive these gentlemen as members it should clear its skirts by expelling those of its membership who do similar work. Such a thing as a violation of professional ethics should be more severely punished inside an organization than outside and an adverse decision in this case cannot honestly be anything but retroactive.

The secretary of the association having recently had two or three requests for information regarding the best methods of going after irregular practitioners, we reproduce from the *Journal A. M. A.*, an article entitled "How San Antonio Rid Itself Of Fraudulent Medical Practitioners."

"Many communities are afflicted with medical fakers because no one takes the initiative in suppressing frauds of this character. Members of the medical profession are sometimes loath to do so because of the belief that the public will misconstrue their motives. In most instances the civil authorities have been indifferent. And so these frauds flourish.

San Antonio, possibly because of its reputation as a health resort, has been a fertile field for medical frauds of all sorts, but through the action of the Bexar County Medical Society has been almost completely rid of such people. Texas has a medical practice law which differs little from the practice laws of many other states, but under the vigorous action of the legislative committee of the county society headed by Dr. Charles A. Dixon, chairman, assisted by their attorney, Mr. J. I. Kercheville, regularly employed by the committee, practically all of these people have been driven out of the community. Only three firms of advertising specialists remain, and against the men composing these firms charges have been filed for the revocation of their licenses.

The procedure adopted was, first, to procure from the records of the

district clerk's office the names of all registered physicians of the county. These were printed in a pamphlet and one mailed to each member of the county society with a letter asking him to carry the list with him and to report the names of all unregistered practitioners to the chairman of the committee. Each case of these illegal practitioners, including those who advertised in the extravagant manner usual to such individuals, was taken up and investigated. A patient would be sent to them and in this way evidence secured against them. An affidavit was then filed in the criminal court, the persons arrested and the case set for trial, which seems to be a method of procedure provided in Texas without having a preliminary hearing and obtaining the usual grand-jury indictment. The cases were then tried and in all but two or three instances convictions were obtained. The prosecutions for violation of the postal laws were, of course, brought in the federal court.

This work was approved by the courts and by the citizens generally. It is, of course, the interest of the people which is best served by such action, but they do not always so understand it and it is gratifying in this instance to note that the work of the physicians of Bexar County had the hearty approval of the public.

The list of prosecutions, a statement of each of which is given herewith, shows how sorely San Antonio and Bexar County were afflicted with medical frauds of great variety. The list, with the other information contained in this article, was furnished by Dr. Charles D. Dixon from the court records and from his own files as chairman of the legislative committee of the Bexar County Medical Society.

Following, we quote a few of the cases from the list given:

Philicarpa Reuda came to San Antonio from Mexico and began practicing medicine without registering his license. He was arrested, June 5, 1912. At the trial, July 15, 1912, he pleaded guilty and was given a fine of $50 and one hour in jail.

J. Martin, a Mexican, was arrested, May 15, 1912, for selling medicine on the street and recommending it to cure any kind of disease. On Sept. 11, 1912, when his case was called, it was found that he had left the country, forfeiting his bond.

"Dr." F. Pierce, an old negro, called himself an "Indian Doctor," making and prescribing his own medicine. He was arrested, Sept. 30, 1912, for practicing medicine without a license and pleaded guilty, Feb. 19, 1913. He was fined $50 and given one hour in jail.

W. L. Dorn, a negro "magnetic healer," was arrested, Feb. 4, 1913, and pleaded guilty, April 24, 1913. He had no license. He was fined $50 and given one hour in jail.

"Prof." A. F. Haslem advertised a preparation under the name of "Mrs. Black's Compound" for all irregularities of women. Letters directed to him requesting medicine and directions for producing a miscarriage, were promptly answered, supposedly giving the desired information. A woman was also sent to see him. He examined her by looking into her eyes through a magnifying glass, telling her that she was pregnant. He prescribed remedies to produce abortion. He was arrested, Nov. 15, 1912, for violating the postal laws, convicted, May 20, 1913, and sentenced to eighteen months in the United States prison at Fort Leavenworth, Kan.

"Mrs. Dr." Susanna Norton used the United States mail for sending medicine to produce abortion. She was arrested, Nov. 15, 1912, and convicted, Jan. 8, 1913. She was fined $250 and her license to practice midwifery was revoked.

Dr. A. G. Dellenbaugh was arrested, Sept. 30, 1912, for practicing medicine without a license. He pleaded guilty, May 7, 1913, and was fined $50 and given one hour in jail.

MEETING OF STATE, MUNICIPAL AND COUNTY HEALTH OFFICERS, OCTOBER 28-29, 1913.

MORNING SESSION, 1912.

Introductory Address, by Dr. E. H. Galloway, Secretary of the State Board of Health.

A. LEGAL ASPECT OF A HEALTH OFFICER'S WORK.

1. The Legal Status Of Health Laws—Geo. B. Ethridge, Assistant Attorney General (10 minutes.)

2. Procedure In Different Courts—Dr. W. H. Rowan, Chief Sanitary Inspector (10 minutes.)

Discussion—Dr. M. J. L. Hoye, Dr. A. G. McLaurin, Dr. W. D. Beacham, Dr. A. K. Barrier, Dr. G. W. Land.

B. COOPERATION AS A FACTOR IN EFFICIENT HEALTH WORK.

1. The Health Officer In Relation To The County Medical Society—Dr. J. W. Young (10 minutes.)

2. Agencies That May Be Employed In City And County —Dr. H. L. Sutherland (15 minutes.)

3. The Relation Of The Mayor To The Health Of Town And City—Hon. S. J. Taylor (10 minutes.)

4. Methods Used In Securing Co-operation In The Solution Of Public Problems—Dr. D. W. Jones (15 minutes.)

Discussion—Dr. J. M. Furr, Dr. J. F. Merritt, Dr. T. F. Conn, Dr. D. C. McLean, Dr. W. T. Mathews, Dr. H. B. Cowart, Dr. J. H. Stone.

C. PUBLICITY AS A MEANS OF OBTAINING RESULTS IN PUBLIC HEALTH WORK.

1. The Ethics Of Health Publicity—Dr. J. J. Haralson (10 minutes.)

2. The Use Of The Press—Dr. Willis Walley (10 minutes.)

3. Local Organizations—Dr. G. H. Wood (10 minutes.)

Discussion—Dr. S. E. Rees, Dr. H. C. Watkins, Dr. J. C. Rush, Dr. J. O. Ringold, Dr. G. C. Phillips, Dr. R. A. Creekmore.

D. THE PUBLIC SCHOOL AS A MEDIUM OF EDUCATING THE PEOPLE ON SANITATION.

1. Methods Used In Enlisting The Interest Of The Children In Local Health Problems—Dr. C. S. Priestley (10 minutes.)

2. The Relation Of The Health Officer To The Teaching Of Sanitation In The School—Dr. Robert Donald (10 minutes.)

3. Medical Inspection Of Public Schools—Dr. Percy Wall (15 minutes.)

Discussion—Dr. D. W. Coker, Dr. H. S. Capps, Dr. W. W. Eley, Dr. J. E. Oakley, Dr. H. F. Tatum, Dr. J. F. Brewer, Dr. W. H. H. Lewis.

E. PROMULGATION OF THE RULES AND REGULATIONS OF THE STATE BOARD OF HEALTH.

1. The Use Of The Agencies Of State Board Of Health By The Local Health Officers.—Dr. P. R. Brown (10 minutes.)

2. The Education Of The Public On The Rules And Regulations Of the State Board Of Health, Through Local Organizations.—Dr. T. M. Dye (10 minutes.)

Discussion—Dr. T. J. Hughes, Dr. A. M. Harrelson, Dr. S. L. Stevenson, Dr. H. P. Boswell, Dr. T. R. Trotter, Dr. J. L. Parks.

F. VITAL STATISTICS.

1. Morbidity—Dr. B. S. Hood (10 minutes.)

2. Mortality—Dr. F. L. Watkins (12 minutes.)

3. How May Vital Statistics Be Used In Enlightning The Public On Health Problems.—Dr. F. J. Underwood (10 minutes.)

Discussion—Dr. T. M. Jones, Dr. B. R. Smith, Dr. J. D. Gilleylen, Dr. J. S. Eason, Dr. I. A. Shelby, Dr. W. C. Brewer.

G. MUNICIPAL INSPECTION.

1. The Protection Of Food Stuff—Dr. O. W. Stone (10 minutes.)

2. Care Of Public Buildings.—Dr. L. W. Magruder (8 minutes.)

3. Sewerage And Water Supplies—Dr. W. C. Elliott (10 minutes.)

4. Destruction Of Fly And Mosquito-Breeding Places.—Dr. J. M. Catchings (10 minutes.)

5. Dairy And Milk Supply—Dr. John Stanley (10 minutes.)

6. Score Cards And Reports—Dr. W. H. Aikman (10 minutes.)

Discussion—Dr. G. Y. Hicks, Dr. J. L. White, Dr. R. J. Brown, Dr. O. H. Swayze, Dr. H. S. Tucker, Dr. E. S. Bramlett.

H. RURAL SANITATION.

1. How To Obtain Community Interest In Rural Sanitation—Dr. J. S. Sanders (10 minutes.)

2. Economic Value In The Eradication Of Hookworm Disease On Rural Life.—Dr. D. J. Carr (10 minutes.)

3. The Sanitary Privy.—Dr. H. F. Garrison (10 minutes.)

Discussion—Dr. M. L. Batson, Dr. J. W. Moody, Dr. R. M. Butler, Dr. J. L. Parks, Dr. W. W. Hickman, Dr. W. W. Eley, Dr. E. F Arnold

L. LABORATORY.

1. Sending Specimens To The Laboratory.—Dr. C. R. Stingily (12 minutes.)

2. The Diagnostic Value Of Blood Smears.—Dr. J. O. Gurney (10 minutes.)

3. Limitations Of A Laboratory Diagnosis.—Dr. J. W. Eckford (10 minutes.)

4. A County Health Officer In Relation To State Board Laboratory.—Dr. W. I. Arledge (10 minutes.)

Discussion—Dr. J. H. Portwood, Dr. L. Costley, Dr. W. G. Abernathy, Dr. W. H. Scudder, Dr. W. D. Arnold, Dr. C. G. McEachern, Dr. A. L. Chapman, Dr. U. S. Wasson, Dr. D. G. Bardwell.

EVENING SESSION, 8 O'CLOCK.

Address, by Dr. W. A. Evans, of Chicago, Illinois.

WEDNESDAY SESSION, 9 TO 12 O'CLOCK.

Address, by Dr. W. A. Evans, to the Health Officers.

Society Proceedings.

East Mississippi Four-County Medical Society met at Tupelo Aug. 19th. for discussion of the following program: "Medical Treatment Of Exophthalmic Goiter," B. Fontain, Memphis; "Diagnosis And Treatment Of Surgical Kidney," O. S. McCowan, Memphis; A Symposium On Pellagra, Dr. Lavinder P.H. and M.H.S., and W. Hfl Rowan of the State Board. Tupelo is to be the permanent meeting place of the society in future and meetings will be quarterly instead of monthly. The next will be held Dec. 3rd.

F. J. Underwood.

Book Reviews.

THE PRACTICAL MEDICINE SERIES, comprising ten volumes on the year's progress in medicine and surgery. The Year Book Publishers, 180 N. Dearborn Street, Chicago. Price of series $10.00. Vol. 1. Series 1913. General Medicine. Edited by Drs. Frank Billings and J. H. Salisbury. Price $1.50.

This little book gives excellent abstracts of the literature of the past year. It includes the infectious diseases, diseases of the circulatory organs, of the blood-making organs, of the ductless glands, of metabolism and of the kidneys. The abstracts cover well the leading articles that have been published in the past twelve months and foot-notes indicate where the original can be found in case the reader wants fuller description than is given in the abstract.

E. F. HOWARD.

VOL. II.—GENERAL SURGERY. Price $2.00.

The book is a complete review of new things in surgery. To one who has but a few spare minutes between calls and sleep no book could appeal to him better. One of the most interesting chapters in the work is a full review of the different manner in which all the European surgeons operate. It is exceedingly interesting to note each surgeon's little peculiarities and that each man uses some little method, it may be a different suture, in all his work. The book is exceedingly well edited and one surely gets his money's worth when he buys it. Like the other books of this series it is complete and straight to the point, and really is in itself worth the price of the other eleven.

S. W. JOHNSTON.

VOL. III.—EYE, EAR, NOSE AND THROAT. Price $1.50.

In the section on the eye will be found a review of the more important papers of the year and considerable space is given to the optometry question.

Practically all of the ear section is given up to purulent middle ear infections and the complications.

A good review of literature on accessory sinus disease is part of the nose section.

M. H. BELL.

VOL. IV.—GYNECOLOGY. Price $1.35.

The editors have made an unusually good selection of literature and abstracted it with much skill. The result offers an excellent guide to the year's work in gynecology as well as a source of no little information.

E. F. HOWARD.

VOL. V.—PEDIATRICS, ORTHOPEDIC SURGERY. Price $1.35.

Diseases of the newborn, infant feeding, infant mortality, gastro-intestinal disorders, the acute infections, diseases of the respiratory apparatus and of the genito-urinary system, and diseases of the nervous system, are the chief heads considered, in the part given to pediatrics, and that on orthopedic surgery covers quite well the joints, spine, extremities and infantile and other paralyses.

E. F. HOWARD.

The Tri-State Society of Mississippi, Arkansas and Tennessee will meet in Memphis Nov. 11, 12 and 13.

MISSISSIPPI MEDICAL MONTHLY

VOL. XVIII. NOVEMBER 1913. NO. 7.

CARRIERS.

HOWARD D. KING M.D.,

NEW ORLEANS, LA.

The discovery of the "carrier" as an agency in the transmission of diseases is a comparatively recent event. At the outset it would be well to have a definite conception of what really constitutes a carrier. A carrier of any particular disease is a person who bears in certain of his organs the particular organism which is believed to be the cause of the disease, in a more or less pathogenic condition, and so placed as to be capable of being transmitted to susceptible persons. The carrier may or may not have previously suffered from the disease in question. In the great majority of cases he has. Usually, too, he is in abnormal health though he does not present the special symptoms of the disease of the germ of which he is a carrier.

While a great deal of interest attaches to the carrier as a previously unrecognized channel of transference of disease and as an important factor from an epidemiological point of view, the belief that the carrier is more than a mere transmitter of infection is arousing still greater interest. In the earlier days of bacteriology, with increasing bacteriological knowledge had come increasing difficulty in understanding how and where certain causal organisms maintained their vitality between the recognized occurrences of the corresponding diseases, whether in the form of epidemic outbreaks or in that of endemic prevalence, to which they gave rise. In part, the explanation, no doubt, was to be found in the probable existence of undetected or unrecognized cases of disease, which might serve to maintain the life chain of the organism, but this hypothesis does not cover the case fully. Then quite a bit of credence was given the theory that disease organisms live a saprophytic existence outside the human body. This theory at first was received with considerable acclaim by the bacteriological world,

but as the result of closer studies fell more or less into discredit. Then came the discovery of the carrier, and accompanying it the view that the carrier of the disease is not, like inanimate agencies, a passive transmitter of infection, but also a breeding ground and abode of certain disease germs. These organisms live and thrive in the body of the carrier, from which they are able to be excreted and thus give rise to the disease in others.

It is not only the sick who may be carriers, but also healthy persons in the role of carriers, and, therefore, disseminators of infection. Thus, bacteria are divisible into two large groups: firstly, those who have suffered from the disease and recovered, but have not yet entirely rid themselves of the germs; and secondly, those who shelter the pathogenic germs without ever having been attacked by the said disease.

In both instances the important point is the total absence of any symptoms which could demonstrate the infectious process of the virus upon the body of the germ-carrier. It might be argued that in every case of infectious disease the attacked person becomes a bacteria carrier. But this is not true as in most cases the germs disappear entirely from the invaded subject after a certain period has elapsed, shorter in uncomplicated and longer in chronic cases.

While the carrier has served in many instances to throw light on many obscure problems of epidemiology, caution must be observed lest we over-estimate the potentiality of the carrier and neglect some other equally important factor concerned in the spread of the disease. Before the spread of any infection is attributed to be of carrier causation care must be taken to exclude all other avenues of infection. Just because a person is a carrier—transports a particular germ—is no reason to lay the blame for an outbreak of that disease in the neighborhood of the carrier on the carrier. For instance, a certain disease spreads, the origin of which cannot be discovered in the ordinary sources, then a carrier is discovered who has never suffered from the infection. Can it then with any degree of positiveness or scientific accuracy be said that this particular carrier is the cause of the spread of the disease? What evidence is there that the carrier has not acquired the organism—harmless to himself—of which he is the carrier from the same source as those who have been stricken with disease? Under such circumstances it might prove difficult to refute the statement that he had derived the organisms from these very person, *i. e.*, the sick. As an illustration the following example might be

cited. Systematic examination of the nasal and faucial membranes of the attendants of a diphtheria ward of a hospital would reveal the presence of diphtheria bacilli in the throats of several, but would it not be absurd to conclude that these attendant carriers were the cause of the disease in the patients of the hospital ward? The carrier is only liable to indictment from an ætiological point of view when he has been such for a long period of time.

Now, what are the diseases in which carrier cases occur? The most common and in their order of importance are typhoid fever, epidemic cerebro-spinal meningitis, cholera, dysentery, pneumonia, and, in a minor degree, possibly, scarlet fever, influenza, pertussis and tetanus. The pathogenicity of the tetanus carrier is self-limited, and this under varying conditions. The hypodermatic administration of quinine to a tetanus carrier is always, more or less, fraught with danger. Deserving of comment is the fact that those diseases of which the infection is most readily conveyed from the sick to the healthy during the height of the illness, rarely, if ever, give rise to carrier cases. Outbreaks of measles, smallpox and chicken-pox have never, except in the rarest of cases, been credited with return cases; nor has even a suggestion been made that they ever become carrier cases.

In regard to scarlet fever it would appear necessary, in order to account for many of the facts in the diffusion of the disease, to postulate carrier cases analogous to the demonstrable passive bearers of the diphtheria organism, and the more recently discovered typhoid carriers. The excretion of typhoid bacilli has been demonstrated to be an intermittent phenomenon, and a similar process may be inferred in scarlet fever. There seems to be little basis for seeking an extra-corporeal habitat for the infectious material of scarlet fever with the possible exception of the cultural medium—milk; and a view more agreeable with all the facts would appear to be that there is constantly disseminated throughout the community the *contagium virum*, whatever it may be—of scarlatinal infectivity, which under suitable conditions becomes communicable from person to person, varying in infectional severity, and from time to time manifesting sporadic or epidemic tendencies.

A carrier should not be adjudged so unless there is confirmatory bacteriological evidence to sustain the claims. Unfortunately, in the great majority of cases, it is only the carrier known to have previously suffered from the disease who is likely to be detected by other than bacteriological means. Thus

in maladies of uncertain bacteriological causation most of the carriers are overlooked, and for that reason it is only those diseases of which the bacteriological origin is known can anything definite be said about the etiologic influence of the carrier. In scarlet fever, of which mention has just been made, the bacteriology is obscure, and the return cases offer sufficient evidence to reasonably assume the presence and influence of carriers. The greater number are temporary, but, once in a while, chronic cases develop. It is still an unsettled question whether the large number of cases of scarlet fever that arise of which the origin can be traced to no previous case are in any measure due to carriers. It is not unreasonable to believe that the infective agent of scarlet fever can remain alive and potentially pathogenic outside of the human body for some time.

However, the most important questions that can be raised concerning carriers are: are carriers a cause of the diffusion of the continued prevalence of disease? If they are a cause, to what degree do they exert their influence? How can that influence be overcome?

These questions can be answered satisfactorily only when the pathogenic scope of the carrier is definitely determined. Therefore, answers to the above queries will be confined to those diseases in which there enters into relationship the carrier. To the first query "Yes" is the answer. In view of our present knowledge and the wealth of recent scientific investigations on this most important subject a negative reply would be altogether out of the question, at least as concerns typhoid fever, diphtheria and epidemic cerebro-spinal meningitis.

In answer to the second question due regard must be given various circumstances. Inasmuch as the great bulk of evidence collected is based on incomplete statistics and unreliable bacteriological information, no accurate estimate at this time can be given as to the extent of the influence exerted by carriers. However, we do know that they are potent agencies in the diffusion of disease and contribute greatly to epidemic outbreaks of a restricted character. It is in the spread of typhoid fever, diphtheria, and epidemic cerebro-spinal meningitis that the carrier plays a most important part. In these particular diseases the influence of the carrier is far-reaching.

The unyielding chronicity of the typhoid carrier is what makes of this particular carrier such a powerful agent in the spread of disease.

In diphtheria the influence of the carrier seems to be, more or less, restricted. A great number of convalescents from this

disease are carriers, and yet the number of cases following their discharge is very small. Chronic carriers are rarely met with.

The chronic carrier in scarlet fever occupies a position similar to that of the diphtheria carrier. The continued prevalence of scarlet fever and diphtheria is undoubtedly kept up through mild and unrecognized cases, and not entirely to carriers as has been so frequently stated.

In answering the third query it must be recognized that a human carrier who has been proved to be a source of infection cannot be dealt with in the same drastic fashion as an inanimate and, probably, innocent fomes, and accordingly the services of the bacteriologist and experimental pathologist are being requisitioned to find a way out of this new dilemma. A carrier may invoke legal aid and protest against isolation. The justice of this can be seen when it is known that some carriers remain pathogenic many years, or even a lifetime.

In order that the question of carriers may be intelligently discussed it is necessary to adopt some sort of classification for carriers.

The below grouping is, up to the present time, the most intelligent and comprehensive and while originally applied to only typhoid carriers is now applicable to all disease carriers:

(1) Precocious carriers: those carriers in the incubation stage of the disease.

(2) Persons who have recovered from the disease, but who continue to excrete the causal organism. This group may be further subdivided into convalescent and chronic carriers, convalescent carriers being those in whom the elimination of bacilli cease before the end of the third month; while chronic carriers are those who eliminate bacilli for an indefinite period.

By convalescence is meant that time which elapses between the cessation of acute clinical symptoms and the disappearance of virulent pathogenic germs. This period is known in most of the infectious diseases. Therefore, a carrier is a person upon whom is found pathogenic organisms after a period of time exceeding by far the average time of convalescence known for that respective disease.

Thus, what are the circumstances prompting the retention of causal organisms such an undue length of time in the body?

Recovery from an infectious disease is generally brought about by the development of immunity. This immunity may be of very short duration and the patient may again contract the disease, as pneumonia and influenza; there may even in a short time be a predisposition for new infection such as is

produced in erysipelas and polyarthritis. Then again, the immunity may be a long-lived one as in small-pox, scarlet fever, measles, also in typhoid fever and plague, and less in cholera. This is due partly to the appearance of immunizing substances caused by merely chemical actions in the liquids or an increased activity of the cellular elements of the body. Thus is explained the cause of microbial death and the rendering of the germs innocuous.

Now, we come to the explanation as to how the bacillus-carrying condition is brought about. An indication of the degree of pathogenicity is the power of the casual organism to multiply in the body attacked. When the body is maintaining a spirited defense against bacterial invasion this power of multiplication is seriously retarded. The increased activity of the elements of the body has its origin in increased tissue irritation or insult. The production of immunizing substances and the power of microbial multiplication are in reciprocal relation, and the few microbes existing still in the bacteria carriers are sufficient to produce such an activity only in a certain degree; the body is, therefore, able to destroy the superfluous microbes as long as this is the case only in a slight measure, but it cannot remove them entirely. Then in the body there are a few germs which can live there for a long time, because they do not multiply to any extent and are not troublesome to their own hosts—but a source of danger to others.

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*THE PHYSICIAN'S PART IN CHILD TRAINING.

MARGARET CARAWAY M.D.,

GULFPORT.

Child training is not a new subject, but to-day thinking men and women are approaching the subject in a new manner and in a new spirit.

The training of the child rests primarily upon the parents, but more and more we are realizing that there are obligations resting upon each of us to children in general, and this is peculiarly true of the medical profession.

Our responsibilities do not end when we have looked well after the child physically, but our technical knowledge demands that we do our share in training the child to better morals and more efficient mentality.

*Read before the Harrison County Medical Society.

The relation of family physician is not as strong as it once was, but it is one that should be fostered both by the physician and the laity; for in that stronghold of confidence the doctor is in a position to more perfectly discharge his duty to the children without arousing suspicion as to the disinterestedness of his motives.

The public generally is awakening to the responsibility of better-born and better-reared children. The magazines are discussing the matter with an openness and freedom undreamed of a few years ago, and as young men and young women are better informed they will ultimately turn to the doctor for a final verdict in these vital matters, and if they are not to find us wanting, we must give time and honest thought to these subjects, and be ready to discuss with them and advise them to the best interest of coming generations, and the more fully we realize the truth of the eugenic slogan, "The proper training of a child should begin at least a generation before it is born," the more intelligently will we meet our responsibilities.

If only we could give to the child parents who are physically, mentally and morally fit, further training would present few problems, and it is toward this ideal of parentage we should try to influence our young people of to-day.

It may seem a far cry to ideal mating, but some of the grosser errors and mistakes could be eliminated by proper instruction of the young and by some legal restraint as to marriage of the diseased or imbecile.

Give our girls a fair show, educate them in sex hygiene, show them what certain diseases in their young men associates mean, then if such an one comes a wooing, we can trust the average girl with her eyes fully open to turn down "The Damaged Goods" and look elsewhere for her mate.

Likewise take care of the boys: let the physician do his part, point out to the father his duty to the boy in the matter of sex instruction, and if necessary, help him to properly inform his boy of the serious risks of immorality, not only to himself but to the family he may some time have.

Show him the true facts of venereal diseases and the principle of self-preservation will often save him when merely moral or religious scruples would not avail.

The laity are learning rapidly, and are more ready for instruction than we fully realize. The campaign of education in regard to the white plague has shown us what advances can be made by educating the public, and if it were possible to so educate them in regard to the hidden diseases, there would be

fewer handicapped or barren women, and fewer blinded, stunted, sickly children; and it seems to me that this wailing of unjustly born children should ring most insistently in the ears of the medical profession, because we know and understand the hidden reasons of their suffering, and because we do know, those unborn of the future have a right to look to us for help, and we can only help by teaching the people, by letting in the light on these subjects so long shrouded in darkness.

As physicians we can lend our influence to any general movement looking to that end. Individually we can familiarize ourselves with suitable literature for the young bearing on those delicate subjects, and we can each conduct a quiet campaign of instruction as we follow our daily round of professional duties, and we try to mitigate the evils of heredity which have descended on the helpless children of to-day, let us renew our effort to pass a fairer heritage to the children of to-morrow, by showing the truths of life in their sternness and beauty, to those who shall continue the generation.

"HEALTH AND HYGIENE"

MISS MARJORIA STEWART,
Woolmarket Consolidated School,
BILOXI.

In order to keep healthy, we must know how to care for the body; how, when, and what to eat; take exercise; abstain from bad habits; destroy germs and prevent diseases by the use of disinfectants, and in general know and observe the laws of health and sanitation. The resisting power of the body will cooperate with us in carrying this out and will aid in destroying germs and removing the impurities out of the body. This power works harder when the germs are first attacking the system.

The skin is for the protection of the body and through it part of the impurities of the body are thrown off, hence, the body should be bathed daily in warm water so as to remove the waste matter and thus keep the pores open. Cold bathing closes the pores and thus protects the body against cold and also tones up the nervous system.

In this connection comes the discussion of the nails, hair,

*Prize Essay, Gulfport, March 29th, 1913. Prize offered by Harrison County Medical Society.

teeth, ears and eyes. The nails should be kept thoroughly cleaned at all times or else they become the hiding places of germs. The hair and scalp should be washed every week with soap and water in order to keep down dandruff and other scalp diseases. The teeth must be washed after each meal and thus be prevented from decaying, for decayed teeth cause bad health, resulting from improper mastication. We should not bite anything hard enough to break the enamel of the teeth. A dentist should examine the teeth at least twice a year in order to detect and repair the cavities of the teeth. Often the ears are injured by rough treatment. The ears should not be picked with hard substances for this may cause inflammation and deafness. The care of the eyes is the most important of all. While reading, if the eyes become tired, one should stop immediately. Care should be taken not to strain the eyes while recovering from sickness. Reading by twilight or improper lights is injurious to the eyes. The former should not be indulged in at any time and the latter can be avoided by using white or blue lights, preferably, student lamps. An oculist should be consulted as soon as any defects are noticed.

The body must be protected from exposure and must be aided in its proper development. Care should be taken not to expose the body in severe weather, and plenty of comfortable clothing should be worn at all times. Oftimes the body is caused to assume unnatural proportions by wearing tight clothing. This compresses the organs of the abdomen and prevents them from developing and performing their functions. Clothing with low neck and short sleeves should not be worn especially during cold weather. High shoes should be worn in winter but high heels should be avoided as they throw the body out of its natural position. We should not wear heavy clothing and shoes one day and light the next.

The body must have rest. Nature demands that we sleep. During waking hours energy is used faster than it is stored in the cells, and the tissues are worn out. During sleep the opposite is true, the muscles are strengthened, the breathing is less, and the nervous system has an opportunity to recuperate from the activities of the waking hours. Night is the best time for sleep because the ears and eyes are rested by the silence and darkness. Sleep at regular times and not less than eight hours.

We should have our meals at regular times and not eat between meals. A variety of food, such as eggs, vegetables, meat, rice, milk, butter, bread and fish should be eaten. But we

should abstain from pickles, peppersauce, flavorings and iced drinks. Care should be taken not to overwork the stomach.

Exercise is very important for it aids in moving impurities from the blood. Some of the more important forms of exercise are running, jumping and swimming. Deep breathing causes all muscles of the chest to be exercised and sends air to the secluded parts of the lungs. It is injurious to stay in a draft after taking violent exercise.

We should not abuse our body by participating in injurious habits. All patent medicines are frauds. They destroy the resisting power of the body and permit the disease to get a hold on the system, then it is a hard fight for the health to be restored. Tobacco contains a poison which injures the nerves, makes the heart beat slowly and reduces the temperature of the body. The smoking of cigarettes is the most injurious form of using tobacco. Morphine weakens the system and causes us to lose control of the mind and body. Alcohol burns the mucous membrane of the stomach, increases the flow of gastric juice and overworks the liver and kidneys.

We must keep our surroundings sanitary. Cleanliness is the greatest disease-preventative known. If everything we eat, use and wear is not clean we may expect to be unhealthy. Every home should have a sanitary closet and thus banish one of the worst enemies to health. Unsanitary closets are the cause of so many diseases being transmitted through water and flies. While if we have sanitary closets, flies cannot get to the excreta, and the water is not infected. Screening and draining are ways of preventing many germ and transmissible diseases. The flies and mosquitoes are screened out and when the land is purified by drainage the mosquitoes are destroyed. The best way to get rid of dust is by using a damp cloth and by mopping the floor. By these methods the germs are not scattered and blown through the air as they are when a duster and broom are used.

Germs can be destroyed by disinfectants, such as chloride of lime, sulphur, carbolic acid, bichloride of mercury, fresh air and sunshine. We should live in fresh air since it supplies the life-giving oxygen for the blood. If a number of persons are in a tight room the air is soon poisoned by the carbon dioxide and other impurities which are thrown off from the body and the persons will die in a few hours if they do not get fresh air. All homes should be well ventilated. The proper way to breathe is through the nose, for in this way the air is warmed and purified before it reaches the lungs. It is injurious to

breathe through the month. The air at night is very pure for the dust and germs are settled by the dampness. Sunshine is a skin purifier and germ destroyer.

We should not be exposed to diseases while young in order to get through with the disease before old age. We can prevent the following diseases by complying with the health regulations: measles, mumps, whooping-cough, colds, meningitis, tuberculosis, typhoid fever, scarlet fever, malaria fever, spotted fever, dengue fever, bubonic plague, syphilis, hookworm, sore eyes, gonorrhœa, ophthalmia neonatorum, cholera, dysentery, diphtheria, impetigo, smallpox, chicken-pox and yellow fever.

Tuberculosis is a contagious disease and is also transmitted by flies, the excreta and sputum. We have tuberculosis of the bone, joints, lungs and other parts of the body. The treatment is fresh air, sunshine and plenty of food.

Malarial fever is a germ disease transmitted by the mosquito. Typhoid fever is transmitted by flies, kissing and water. We ought to stop the propagation of these diseases by not coming in contact with them, and should we happen to have a contagious disease, we should stay in a room and no one should be allowed to enter except the nurse and doctor. The room should be thoroughly fumigated and cleaned before anyone else uses it.

In conclusion ,I will say that one can maintain good health through life by caring for the body in the proper way. By protecting it at all times from injuries; by having a regular time to eat and sleep; by taking exercise each day; by abstaining from all bad habits; by keeping everything clean and sanitary; by screening and drainage; by following the proper precautions given us by the boards of health; by preventing the disease germs from entering the system; by getting fresh air and sunshine; by observing all these important things and with the aid of the natural resisting power of the body, one can reasonably expect to live a long and happy life.

*PLUMBISM OF GUNSHOT WOUNDS.

T. F CLAY M.D.,
TUTWILER.

The chief object of this paper is to report a case coming under my observation recently.

*Read before the Clarksdale and Six Counties Medical Society.

Just a few remarks and I shall give you the case.

This condition, Plumbism In Gunshot Wounds, really a sequella, is not met with as often as in former times; because of (1) the introduction of higher power firearms with a reduction in caliber of same; (2) the use of the more modern steel or metal-jacketed projectiles.

Of course there can be no plumbism if the projectiles or missiles do not lodge in the body. Lodgment is less frequent than formerly for the reasons given above—higher power, hence more penetrating; and metal-jacketed projectiles which separate less easily nor batter against bone to amount to anything. This, of course, is most applicable to rifles, for the majority of our pistols and shotguns are little changed. Hence we readily see that most of our cases of plumbism in gunshot wounds are the result of injuries inflicted by one of these last named with the lodgment of their projectiles or missiles. Even though a metal-jacketed projectile should become lodged, it rarely gives trouble unless it is by relation to nerves or arteries; but, because of its comparative lightness and smoothness of surface it most usually becomes encysted. Of the lodged projectiles or missiles, those lying in the bone-marrow or under periosteum of the bones are most apt to give trouble; because of the readiness with which these regions absorb the lead into general circulation.

Females are more apt to develop plumbism under similar conditions and injuries than males, for they are more susceptible; adults are more prone to have this sequella than infants and children, for the same reason. The symptoms in this condition do not vary from those found in plumbism from other sources, as I shall not attempt to take them up separately and in detail, but mention them just as they came up in the case.

History of the case: H. L., negro, male, twenty-one (21) years old; came to my office on December 6th., about four (4) p. m. Family history negative so far as I could ascertain.

Present illness and subjective symptoms: on November 6th. last, thirty-six days before I saw him, he was shot at a distance of twenty-five steps with a shotgun loaded with Number 5 shot. He fell unconscious and remained so for one and a half hours. There was profuse expectoration and vomiting of blood, also hemorrhages from nares and wounds of body and head.

He remained in bed two and a half weeks after which time he began sitting up and was soon about the house. No effort was made to remove any of the missiles, only a treatment of

the wounds. There was a slight pus discharge from most of wounds of the body. The hematemesis subsided after the first thirty-six hours; the hemoptisis after first week and epistaxis after first two or three days.

Improvement was slow. Almost from first, he suffered from a dull frontal headache and pain beneath sternum when sneezing, gaping or taking a long inspiration; soreness in muscles of left arm and pain when pressure was brought to bear on lower right incisor tooth or the shot under the right eye. There was marked anorexia and emaciation.

Aching, with occasional sharp shooting pains, radiating down arm began in left shoulder about three (3) weeks from date of injury, or November 27th. In the course of three or four (3 or 4) days he noticed a fine tremor ("nervousness," as he expressed it) in left upper extremity, which gradually grew worse. In about a week the right member became effected with the tremor. Marked colicy pains in abdomen, about umbilicus, began about eighteen hours before I saw him. Diarrhœa preceded the colic about eight or ten hours, while all the previous week his bowels had been obstinately constipated. Ptyalism began about same time as diarrhœa. Shortly following onset of tremor he began to notice muscular weakness in upper extremities, especially in trying to grip any object.

Examination and findings: there was slight wrist drop on both sides; more marked on left; almost complete loss of gripping power in hands, less marked in right; a fine tremor of both members, more marked in left. The tongue was heavily coated down center and red on edges, with a moderate tremor when protruded from mouth. The gums were swollen and red, and showed a blue line near their margins. Ptyalism was rather marked. Pressure on shot in inferior alveola process and the one beneath the right eye caused pain. There was general hyperesthesia over both upper extremities upon firm pressure.

There was general tenderness over the abdomen which was scaphoid on inspection. The liver and spleen were normal in outline so far as I could make out, but the former was slightly tender on inferior border; as was shown by deep palpation and patient taking a long inspiration. The entrance of shot were as follows:

Three (3) in nose, one (1) in bridge and two (2) in cartilaginous portion, one (1) of which was blown from nose two days after injury—neither of remaining two (2) were palpable; one about three-eighths-inch below right eye—palpable and pain-

ful upon pressure; one just external to right supraorbital notch —not palpable; two just above left eye—not palpable; three in forehead—all palpable; one in left parietal region—palpable; one through lower lip into alveola structures—palpable inside lip; one in chin, to left of median line—slightly palpable; one (1) entered œsophagus, below thyroid cartilage—not palpable; three in left shoulder, about joint—not palpable; one in left forearm, about two inches below elbow anteriorly—palpable; one in right arm, below insertion of deltoid muscle—palpable; sixteen scattered over chest, one (1) of which was in fifth interspace and over apex of heart—none palpable; one through left side below ribs. Most of the chest injuries were right at margin of ribs or between them, only one (1) or two (2) directly over a rib.

Treatment: knowing that for permanent relief the shot, or as many as possible, would have to be removed, and that I would do more harm than good by going after those of shoulder without knowing their location, and too, that the surroundings were very poor, I advised institutional care and treatment. Patient said he would gladly go to Vicksburg if I could get him in. This I assured him and only set about to relieve symptoms as best I could. The first thing I did was to give him one-quarter grain of morphine sulphate; next I went about removal of shot in left forearm. It was deeper than I had thought, between flexors and supinator, but succeeded in extricating it. This was under cocaine and adrenalin though handling of arm was painful. He decided to postpone further surgical treatment until in hospital. I then gave him potassium chlorate mouth wash; magnesium sulphate ℥i every two hours for six doses; morphine sulphate to be repeated every four hours S. O. S.; Pot. Iod. grs. 10 t.i.d. P. C. to begin on next day, and a letter to surgeon of Charity Hospital, Vicksburg.

He left two (2) days later, feeling somewhat better able to travel. I wrote to the above institution some days ago to get a line on treatment and number of shot removed. Two (2) days ago I received a letter from the assistant surgeon stating that the only record he had was "admitted Dec. 14, 1911. Diagnosis: lead poisoning and gunshot wounds, and discharged Jan. 1st. 1912 as cured." No record of treatment being on file.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

At the last meeting of the South Carolina Medical Society its president made the following suggestions:

"That a member of this Association be elected and known as Organizer of the S. C. M. A., this officer to be especially selected with a view to his special fitness for this office. That his duties be clearly defined and to consist, first, of setting aside sufficient time each year to visit every county medical society in this state and at a specially called meeting of the county society to give an address, with the object of getting a thorough and complete county organization upon a broad plane, and to organize county medical societies where none are now in existence. That the organizer be paid his travelling expenses and a reasonable compensation while he is actually engaged in organization work for the State Medical Association.

"In order to keep the organizer in touch fraternally with the Medical Association of North Carolina, Georgia and Virginia, that he be appointed delegate to the annual meetings of each one of these states and that his actual expenses be paid, and that he be appointed and be made ex-officio one of the delegates to the House of Delegates of the American Medical Association, with his expenses paid."

This is a more elaborate form of a suggestion that the secretary of this Association has twice made, that the president's traveling expenses be paid for an annual tour of the state in the interests of organized medicine. Our by-laws, Chapter VII, Section 1, undoubtedly contemplate such a visitation and, of course, it would only be fair that the Association foot the bill. Unless such a delegate as the South Carolina proposition suggests should have very definite qualifications as an organizer, he might well prove a failure, whereas, as presidents change annually, one might well be expected to succeed where another had failed. Then, too, the question of compensation would not come up, the work being part of the duties of the president and the hardship not being so great as

if the same man had to get out into the field each year. The writer is firmly convinced that such a method would be found to pay, in actual dollars and cents, and offers it again for the serious consideration of the Association.

It gives us great pleasure to present in this issue an essay by Miss Marjoria Stewart of the Woolmarket Consolidated School, Biloxi, which essay won the prize offered by the Harrison County Medical Society. We are glad indeed that the society is offering such inducements to the study of hygiene and that schools are furnishing opportunities for the acquirement of information on the subject. It is sadly needed, God knows, as the most casual glance at practically any community in the country will witness. But if one may offer an adverse comment on such an excellent production as Miss Stewart's, we beg to assure her that she is misinformed on one point. She says: "We can prevent the following diseases by complying with health regulations: ——, typhoid fever, ——. Typhoid fever is transmitted by flies, kissing and water." We have to advise the clever young essayist that the Mississippi health authorities have not yet attempted any regulations regarding kissing.

Letter to The Editor.

Hattiesburg, Miss., Sept. 30th. 1913.

Dr. E. F. Howard,
Vicksburg.

Dear Doctor—By request of the Forrest County Medical Society I am sending you the following:

In response to an express purpose of Dr. J. D. Donald, member of the State Senate, that he would take up actively the establishment of a home for the feeble-minded children of the state in connection with the Blind Institute at Jackson at next meeting of the state legislature.

The Forrest County Society pledged its hearty co-operation and passed the following resolution:

That the Medical Societies of the State of Mississippi are hereby requested to co-operate with us and to use their influence with their representatives and senators in behalf of the establishment of a home for feeble-minded children of the State

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*TREATMENT OF LARYNGEAL DIPHTHERIA.

THOS. F. CLAY M.D.,

TUTWILER.

The treatment of laryngeal diphtheria may, for convenience, be divided into:

1. Hygienic and Medical.
2. Serum Therapy.
3. Operative.
4. Dietetic.

Hygienic: fresh air is of prime importance since in stenosis of larynx the blood is not properly oxygenated. Place patient in a well-ventilated room, best located so that sunlight is admitted a portion of the day; keep temperature as near stationary as possible, preferably about 70° F.; allow no direct currents of air on patient; no excessive furniture should be allowed; no persons, especially children, permitted to enter sick room save attendants, and they to wear a gown or some covering which is laid off when leaving the room; the patient should have clothes or vessels to expectorate in—the former would be better for they can be burned.

Next I would mention warm baths. It is excellent practice to give a warm bath twice daily, followed by brisk rubbing to stimulate the superficial circulation. The baths or alcohol rubs may be used to reduce fever when necessary—surely no coal tar products. By keeping the skin in the best possible condition, we favor elimination—our constant aim being to counteract and eliminate poisons.

Medical: here I shall first give the best I have seen, that practiced at Willard Parker Hospital of New York City: upon admission the patient is given a warm bath, an injection of antitoxin, vaccinated and sent to ward. There a purgative, calomel, castor oil or salts, is given: if necessary Dover's powder is given to quiet the excited fretful patient; a hot flaxseed poultice is applied to throat and patient put to bed. The

*Read before the Clarksdale and Six Counties Medical Society.

child soon falls to sleep and this gives antitoxin time take effect and saves many a case intubation.

The sublimation of ten to twenty grains of calomel under an improvised tent, and patient allowed to inhale the concentrated fumes, may be of aid in tiding patient over for a period of sufficient length to permit antitoxin to do its work or until a skilled operator can be secured to intubate.

The inhalation of warm steam, from water which may be plain, or contain equal parts of lime water or one dram of comp. tinct. of benzoin to the pint, is often beneficial. The moisture is the chief thing. Of course this is given under a tent, as the above. Be sure to protect patient from the dampness—wrap in blanket or some other cover.

Some advise the use of emetics in strong children, using syr. ipecac or tartar emetic, knowing that vomiting sometimes causes the membrane to be expelled and patient thus relieved. I don't believe in this—certainly not use it more than once.

2. Serum Therapy: the serum treatment is of ultra importance. First let me say that it is our duty to immunize every person who has been in contact with our patient since the disease developed. This is done by the injection of 500 to 1,000 units of antitoxin. The immunity thus rendered usually lasts about three (3) weeks.

This valuable remedy, antitoxin, was introduced in 1894, the germ of the disease having been isolated by Kleb's in 1883.

As to the modes of giving antitoxin: it has been tried in treatment of diphtheria by giving it per orem, per rectum, locally applying the serum and last and best by injection—subcutaneously or intravenously. Dry antitoxin has met with some success but certainly the serum is better when in solution. The dry is very soluble in cold water and can readily be dissolved. I have seen large doses given intravenously, with good results, but prefer the subcutaneous injection.

It goes without saying that we should be as near aseptic as is possible for us to be when injecting this serum.

The sites of injection: may use any place in body where the tissues can be easily gathered up in hand; such as buttock, abdomen, sides of chest and between scapulæ. At Williard Parker Hospital we injected at a point about half way between the middle and posterior axillary lines on level with inferior angle of scapula. The left side was used for the initial injection since each case was vaccinated on left arm, as stated previously. Of course the opposite side was used in case of a

left-handed patient. The intravenous injections are given in veins of arm just as in phlebotomy.

Dosage: it is now quite safe to give our large loses of antitoxin subcutaneously because of the high concentration of available serum. Gibson has concentrated the serum so that we can get 1,500 to 1,800 units per c. c., thus a ten (10) c. c. syringe would hold 18,000 units. The chief objection to giving large doses has been that it was not absorbed, that it produced too great tumefaction at site of injection.

Most authorities advise four to six thousand (4,000 to 6,000) units for "croup," and repeat in twelve to twenty-four hours. It was customary to use moderately concentrated serum (1.000 units per c. c.) at Willard Parker Hospital, giving 10,000 units for initial dose and repeating in eight, twelve or twenty-four hours, as the occasion demanded, where it was deemed necessary.

Repetition of dose or not is governed by pulse, respiration and general condition. If pulse and respiration continue high and general condition does not improve, a second dose is necessary in eight, twelve or twenty-four hours. A third and even a fourth may be necessary.

The very large doses, 25,000 to 40,000 units, which I have seen given intravenously, were in cases of septic diphtheria, which did not suffer from laryngeal stenosis.

3. Operation: let's first see what the indications are which require operation—a child with a progressive stenosis, hence labored respiration with retraction of soft parts of chest and epigastrium, constant tossing and inability to lay down, coupled with an intermittent or a rapid feeble pulse certainly demand operation. A good sign to follow is improper æration of lungs, as is shown by retractions and lack or total absence of respiratory murmur over base of lung posteriorly. This, unfortunately, cannot always be ascertained on account of the noisy respiration, "crowing." Marked cyanosis is a dangerous signal to wait for, it often comes too late; the patient's strength has become exhausted. I believe that a great many cases of the broncho-pneumonia in "croup" cases are caused by waiting too long to intubate.

Intubation should not be practiced by the inexperienced, for it is far more difficult than it looks from first glance. There are occasions which would justify this. Again, no case should be intubated and allowed to remain at home without a competent attendant for the dangers of collapse and even

asphyxiation from auto-extubation are ever present, so long as patient wears a tube.

Intubation: many operators adhere to the O'Dwyer method but I shall give that practiced at Willard Parker Hospital during my service there in 1909:

Equipment which should always be convenient; a set of O'Dwyer's hard rubber tubes, metal-lined or not, with eye of each tube threaded with braided silk and the ends tied together; an obturator for each tube; a metal scale to determine size of tube to use in a given aged patient; a carrier; mouth gag; an extubator; a tracheotomy set; a sheet or thin blanket and safety pins "fill the bill." 'Tis preferable to have a table, though floor could be used.

Operation: given for right-handed operator: wrap child in sheet or blanket and pin securely. With patient prone on edge of table and assistant behind his or her head, the operator takes his position to right side of patient. Place the mouth-gag in position in left side of mouth, if no teeth posterior to incisors no gag is needed, and open carefully and sufficiently wide to permit free access to throat. The assistant grasps the child's head between his or her hands, the left index finger resting between jaws of gag to prevent its slipping and maintain it in position, and holds firmly, extending the head. The operator throws right leg across child, unless there is a second assistant to hold the knees on table, picking up carrier in right hand, which bears obturator and tube, he holds same between thumb and fingers, the index finger resting over the guard and the ball of thumb on trigger on proximal side of carrier. The thread on the tube is thrown over the back of the hand or better, held along side of carrier. You now pass index finger of left hand along over dorsum of tongue until the posterior rhinoglottis is reached, hook up epiglottis and hold firmly, pressing finger as much to the left as space of throat will permit. With carrier held parallel to body of patient pass tube along side, and somewhat under the index finger until the distal end engages in rhinoglottis. Be sure of engagment by feeling with tip of finger, now raise carrier vertically on head tube into larynx. When the tube is well nigh down, push trigger with thumb and at same time with index finger on head of tube, push tube home, withdrawing carrier bearing obturator in the reverse steps of introduction. Tube in place and finger removed there is suddenly a paroxysm of coughing, metallic in character, which coughing brings up mucus and shreds of

membrane. If patient is unable to expectorate this, swab with gauze on end of finger which is really better since it causes more cough and hence the removal of material which might plug the tube. Now remove gag but don't cut thread for several minutes—wait to make sure tube is clear. This proved, have patient open mouth, cut one thread, pass left index finger as before to head of tube, holding same in place, pull thread through the eye of tube and out of mouth. Patient sinks into a sleep only to be disturbed by paroxysms of coughing.

Dangers: inability to pass tube properly by either slipping it into æsophagus or making false passage. If much force is used membrane may be pushed ahead of tube, hence larynx occluded. Do not throw tube from obturator too soon or membrane is apt to plug its lumen while being pushed home. Patient is sure to be asphyxiated if too long attempts are made in tubing. Better make repeated short trials.

Should tube be plugged in tubing or before string is cut, run finger in mouth and with other hand draw tube out by means of the thread, using the finger in the mouth for a fulcrum. Reintroduce tube as soon as lumen is made clear.

If stenosis is below the tube used, hence patient not relieved, it is necessary to extubate, by thread, if it has not been cut and withdrawn, and reintubate with a larger tube. Should membrane be pushed ahead of tube and larynx completely occluded, a larger tube does not relieve, then a trachetotomy is imperative.

Thrust patient upon table so head hangs well over edge. The assistant steadies head, well extended, between hands. The index finger used to steady the soft parts of neck. Quickly make incision in median line, below point reached by tube, down upon trachea, hook up same and sever three or four rings, open wound with dilator and introduce cannlar. Turn patient over to keep any blood out of the wind-pipe. Should such happen, lower head and shoulders and at same time compress chest—may become necessary to pass catheter and suck blood out of trachea and do artificial respiration. Put patient to bed in warm room and treat as after any other tracheotomy.

I think the case, where possible, should be removed to institution before intubation, for many of the pneumonias are produced by suddenly breathing in the insufficiently warm air.

The tube is usually worn from three to seven days. Auto-

extubation before third day usually requires reintubation, while the reverse is true of those properly extubed.

Some cases cannot go without tubes; "chronic tubes," they are termed. Have seen several cases, two, three or four, which had worn them two years or more. These tubes are changed every fifteen to thirty days, as the occasion demands, usually best known to patient. Have seen one of these cases go forty-two days, as best I remember, without change of tube.

Extubation: assistant, patient and operator in same positions as in intubation. Operator introduces finger into mouth the same, gag in place. He holds extubator in right hand, thumb on top of short lever or arm. The instrument is passed same as in an intubation. As soon as peak engages in lumen of tube, press lever with thumb, withdrawing instrument, bearing the tube, in reverse order of introduction. Watch patient for six hours after which time it is rarely necessary to reintubate.

4. Dietetic: nourishment is essential in these cases since they most usually come from poor hygienic surroundings, are poorly nourished and rachitic.

Milk should be the exclusive diet until the temperature is normal and all membrane has disappeared, if there has been any visible. After which time semi-solids are added to diet, as junket, gelatine, cereals, bread crumbled in milk, ice cream, etc.

Some hold to the practice of feeding semi-solids in all tube cases—don't believe this good practice until the local condition has cleared up, as stated above.

It may be necessary to resort to Casselberry's method of feeding tube cases. Patient lies prone in nurse's lap with head and shoulders lower than body, the hands are usually fastened by pinning sleeves of gown to napkin. The milk or water is then given with a spoon. In this position the fluid will follow along posterior pharyngeal wall and thence into œsophagus without causing irritation of larynx, hence coughing.

It is sometimes necessary to feed by gavage tube, a catheter, best passed through nose. Some authors hold that rectal feeding is much preferred to this. I have never seen much results with rectal feeding in such cases.

In conclusion it is only necessary to quote two tables of statistics to show the great stride forward in the past decade in our treatment of this disease:

1. Tube cases in municipal Hospital of Philadelphia, before and after introduction of antitoxin by Fischer:

Year.	Cases	Mortality per cent.
1894—No Antitoxin	100	75.0
1895—50 per cent. received Antitoxin	122	54.9
(52 per cent. Mortality When Serum Was Used.)		
1896-1903—Antitoxin used in all	1212	58.4

2. From one of Jacobi's articles:

	Cases	Mortality per cent.
Preantitoxin period	1336	39.3
Preantitoxin period	662	66.1
Antitoxin used	436	12.5
Antitoxin used	17	36.0

This last is little better than statistics given for Willard Parker Hospital from January 1901 to June 1905.

Total cases treated, 5192; mortality per cent., 26.12; tube cases, 1,396; mortality per cent., 57.87.

*ADENOIDS.

D. G. MOHLER M.D.,
GULFPORT.

Synonyms—Adenoid vegetation, pharyngeal adenoids; pharyngeal tonsils; epipharyngeal tonsils.

Definition—Adenoids are hypertrophied lymph glands which normally exist in the epipharyngeal space.

They are chiefly located on the superior and posterior walls of the epipharynx, though they may extend into the fossæ of Rosenmuller and to the mouth of the Eustachean tubes.

Troutmann divides the adenoid pads into two groups: an anterior and a posterior one.

The edges of the walls of the recessus medius sometimes become agglutinated during acute inflammatory processes, and thus convert the groove into a sinus, which becomes infected and continually discharges its secretions into the pharynx (Thornwaldt's disease).

Etiology—The chief cause of adenoids is the irritation and inflammation occuring in the epipharynx during attacks of one of the exanthematous fevers.

*Read before the Harrison County Medical Society.

It is a well-known pathological law that the lymphatic structures of children become enlarged or hypertrophied in response to bacterial stimulation, whereas, the same stimulation in adults does not cause lymphoid hypertrophy to a corresponding degree.

As the exanthematous fevers occur chiefly in early childhood while the special susceptibility exists, it is but natural to find adenoids most frequently during this period of life. According to statistics on this subject by McBride and Turner, adenoids are most frequently found between the sixth and the fifteenth years of life, though they may occur at any period. In children who were otherwise normal it has been variously estimated that they were present in from one to nine per cent. of all cases examined. In deaf-mutes, they are present in from 50 to 73 per cent. of all cases examined. While it cannot be said that adenoids are hereditary, they are nevertheless, in many instances a family characteristic, perhaps on account of a similar environment and similar anatomical conformations predisposing to infection of the epipharyngeal tissues.

Climate probably plays but a small part in the causation of adenoids, though it should be that a cold, damp, changeable climate subjects the mucosa as well as the general system, to repeated shocks which lower the vital energy of the body and render it an easy prey to microbic irritations within the epipharynx.

Symptoms of adenoids may be divided into three classes: objective, subjective and collateral.

Objective symptoms are those appreciated through the special senses of the attending surgeon. By inspection he notes the open mouth, thick, short upper lip, the comparatively expressionless countenance, and with pharyngeal mirror he finds the epipharynx to be more or less filled with the adenoid masses. By the sense of touch he distinguishes a gelatinous, worn-like massive the epipharynx.

The faulty development of the chest wall is also characteristic of mouth breathing in children. The sense of smell should also be utilized in the examination for adenoids, as a fetid breath is sometimes present. The auditory sense should also be uitilized in the diagnosis, as the patient's voice is often characteristic. The articulation is muffled and the resonance of the voice is diminished.

Subjective symptoms: night times restlessness, the patient often throwing the covers off during the unconscious rolling

and tossing. Day time restlessness—the child is fretful and peevish, or is inclined to turn from one amusement to another, or from imposed duty to play. Aprosixia, or difficult attention, the child has difficulty in applying himself continuously to his studies or other tasks; he has fits of abstraction.

Taste and smell are sometimes impaired which is not strange, in view of the fact that the sense of smell and of taste are so intimately associated, and on account of the blocked condition of the epipharynx child is compelled to breathe through the mouth. The breath is often fetid due to retained secretions and from disordered stomach, so often complained of. An elevated temperature is not an uncommon symptom as the adenoid growth is frequently the seat of læunor or catarrhal inflammation. Epipharyngeal catarrh is an almost constant accompaniment of adenoids. This symptom is one of the strongest arguments in favor of the removal of adenoids, as the catarrhal inflammation has a tendency to extend by continuity of tissue into the eustachian tube and middle ear. In case of an acute infections exacerbation the middle ear and even the mastoid cells are liable to become involved.

Collateral symptoms: defective speech is a symptom of considerable diagnostic and economic importance, the voice is muffled, articulation is imperfect and resonance of the voice greatly impaired. McBride and Turner who analyzed 307 cases, 255 had ear involvement of one kind or the other. Of the 255 cases 144 were suppurative and 11 were more or less deaf with non-suppurative diseases.

Sequelæ: the face or its development is often modified materially by presence of adenoids. The short upper lip, and the protruding and twisted central incisors of the upper jaw, the breadth at upper half of the nose and the narrow slit-like nasal openings all conspire to give the so-called adenoid face. The general expression is one of stupidity. The degree of the facial disturbance varies greatly in different cases, usually in proportion to the degree of the nasal respiration rather than actual size of adenoid growth. If the capacity of the epipharyngeal space is diminished, or its antero-posterior diameter is contracted, a small adenoid mass may produce a more pronounced nasal obstruction than a larger growth in a more roomy epipharynx. The facial expression is more modified in the former than in the latter instance. It should not be deduced from the foregoing statements that the indications for

treatment are in proportion to degree of nasal obstruction *per se*, as there are several other conditions resulting from small as well as larger adenoids that call for their removal as urgently as the complete nasal stenosis.

The interior of the nose is also modified in its development, such as under development of the turbinates and deviated septa, which are common and make such individuals more subject to intra-nasal diseases. Adenoid subjects usually have a gothic or arched palate, especially in antero-posterior. The arch is apparently higher than normal, though this is more apparent than real. The illusion arises from the contraction of the lateral diameter of the upper jaw while the height of the arch remains the same, thus producing a marked disproportion between the width and the height. The contraction of the lateral diameter of the arch sometimes causes the control incisors to protrude and to be twisted upon their axes so as to cause their posterior surfaces to face. The teeth are often irregular, and require the services of a dentist to regulate them.

The bones: Frederick Coolidge called attention to the apparent relationship existing between adenoids and the various forms of club foot. The saying has often been confirmed that if you will show me a bow-legged man I will show you one that had adenoids in infancy. Adenoids affect the nutrition, partly through the anemia present and partly through the excess of carbon dioxide in the blood. The two conditions cause faulty metabolism and nutrition. The bones are deficient in lime salts, hence are soft and easily bent under the weight of the body.

Prognosis: the prognosis from the standpoint of the mentality of the patient varies from slight retardation of mental development to an almost complete arrest of it. The improvement in mental growth after operation is often marvelous, provided the operation is performed during the natural period for such development e. g. during infancy and childhood. If the removal is delayed until the individual has practically attained full growth, the mind will rarely develop to any considerable degree. The general health rarely improves during infancy and childhood so long as marked adenoids remain. If, however, they are removed, the blood becomes red from free oxygenation and all vital energies are quickened and increased. Treatment, operation only.

In conclusion I wish to present a little clipping from the *Medical Word*, which I think brings out in an amusing way, as

well as very clearly and forcibly, some of the evils resulting from the presence of adenoids:

AMERICAN ADENOID ASSOCIATION.

A Modern Fable by E. Clair.

"EDITOR MEDICAL WORLD:—We live in the age of associations and conventions. Recently I attended a large medical convention where, as an educator, I advocated the medical inspection of the schools. The night following my speech the American Adenoid Association convened for their annual meeting in my Caput.

"The meeting was an unusually large one. After the usual speeches of welcome and acceptance, the 'Ads.' got down to business in dead earnest.

"The president, in a fiery speech said: 'We are the sworn enemies of every medical asociation on earth.'

Another Adenoid, from a poor little mouth-breather, jumped to his feet and yelled: 'Already there is a plan on foot to cut us out of existence, as though we were a tribe of American Indians.'

"'I move,' said a big burly fellow, from the nasal passage of a listless little girl, 'that we join with that air League for Medical Freedom.'

"'I second the motion,' said a poor-memory Adenoid.

"Then a fierce debate on the question ensued. Finally, upon the conclusion of a mouthy speech by the Chairman of the Department of Deafness, the motion was unanimously carried.

"The next in order were the reports of the various departments. They all told of rapid growth and abnormal development. At last, the Department of Interfered Blood Supply of the Brain made its report. The members got so excited in gloating over their past year's successes that in the midst of the agitation something gave away, and I awoke."

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*REPORT OF THREE CASES OF TETANUS NEONATORUM.

L. D. HARRISON M.D.,
CLARKSDALE.

On June 19th. 1907, I was called to see Mary H., a well-to-do yellow woman, her husband of the same color and a planter owning his own place and residence in town.

*Read before the Clarksdale and Six Counties Medical Society.

I found this woman in labor which progressed well and in a few hours a healthy child of ten pounds was born. The scissors used in severing the cord were scalded in bichloride solution and carbolic acid. The tape used for the cord was treated in the same way. A cloth with boracic acid powder put on over the cord and bandage applied.

On June 26th., seven days later, I was called to see the baby, as it had failed to nurse for twelve hours. I found it with tonic and clonic convulsions and that peculiar whining cry. These were excited or brought on by the least noise or touch.

I at once recognized it as a case of tetanus neonatorum. Gave large doses of the bromides, with frequent small doses of calomel for the constipation and eliminating effect, gave small doses of morphia sulphate, applied cloth moistened in a mild solution of bichloride over the navel. These gave only partial relief.

I held out no hopes of a cure to the parents, and retired from the case and a negro doctor was sent for. The child died on the 28th., two days from the first seizure.

On December 1st. 1909, I was called to see the woman. She informed me that it was only a few days before her next confinement, and she wanted me to give her some medicine or do something to prevent the child from being like the other.

I found the floor of the bed-room covered with a matting that had been there for about three years. The heavy curtains on the windows covered with dust. I had the matting taken up and burned, the floor scoured and mopped up with a solution of carbolic acid, and room fumigated with sulphur.

On the 7th., I was called to attend her in confinement, the same antiseptic precautions in regard to the child's navel were used as in the first case. The child was perfectly healthy for a few days; navel came off on the 4th. day and the surface dressed with a boracic acid cloth.

I was sent for on the 18th., eleven days after confinement, to see the child. Found it with tetanus neonatorum, saw it about the first hour that it became unable to nurse, at once administered one grain of chloral hydrate per orem and three grains per rectum. This gave partial relief for six hours. After that the attacks returned with increased violence. Five grains of chloral were given per rectum, this quieted the child and spasms grew less frequent; slept for three hours. This dose per rectum was repeated, the child had complete relief for

six hours, sleeping well; afterwards was able to nurse; had two or three more injections of chloral and made a good recovery.

On November 17th. 1911, I was called to visit Ida G., a yellow woman. Husband a mail-carrier, also yellow. Found her in confinement, the floor of the house covered with a ancient matting and everything in a very dirty condition. After three hours labor, a healthy child was born.

The usual antiseptic precautions were used in regard to the child's navel; it did well and the cord came off on the 5th. day.

I cautioned them about sweeping the matting, and had it mopped up with a solution of carbolic acid.

On the 24th., seven days after confinement, I was called to see the child. Found it with lock-jaw. Was told it was unable to nurse for twelve hours.

I at once gave chloral hydrate, five grains per rectum with a calomel purge; navel was treated with a bichloride cloth. This gave partial relief for three or four hours, when convulsions returned and were never relieved in spite of chloral by rectum and per orem. Child died two days after the first attack.

I have mentioned the color of the parents of these children, because I think it a peculiarity that the children of people of mixed blood should have this particular disease.

In my practice of thirty years I have seen several cases of tetanus neonatorum in the yellow race. Not one in the full-blood negro race and but one in the white race.

I would like to have the opinion and experience of others on this nervous disease.

Current Literature.

RAPID STOMACH DIAGNOSIS.

S. Lewis in *Journal of the Medical Society of New Jersey* suggests the following procedure in stomach cases: "The patient is placed on the examining table, the abdomen exposed, a towel arranged under the chin and a siphon of carbonated water rested on the shoulder with the nozzle at the patient's lips. These instructions are given:

"'I wish you to drink some of this corbonated water in order to get some gas into the stomach, which will swell it a

little and help my examination. Please manage the siphon yourself; drink very slowly at first so as not to choke yourself and then drink as rapidly as you can. I will tell you when to stop.'

"The average patient will thus take eight ounces or more without difficulty. In favorable cases even half this amount will bring the outline of the stomach clearly into view, while the mixture of gas and fluid gives to palpation a crackling feel and typical splash apparent to the most inexperienced."

The author finds it particularly helpful in these subjects and in those suffering from relaxed pylorus. In the former, comparison of the percussion lines before and after inflation assists materially. In the latter "the gas rapidly escapes into the small intestine. With a little practice one readily understands this condition and the observation is itself of value. The inexperienced may here be led to wrongly make a diagnosis of misplaced stomach. Percuss carefully during the inflation."

Having followed this procedure in fifty cases, Dr. Lewis pronounces it safe, less unpleasant than other methods and efficient. Comparing it with other methods, he sums up in favor of the one described, as follows:

"(1) Size and position are accurately determined.

"(2) With practice some idea of gastric tone may be obtained. Roughly speaking, four ounces of fluid will lower the border of the normal stomach about an inch. In atony it may lower the border two or three inches.

"(3) Rapidity of escape of gas into the intestines will be a crude test of the tone of the pylorus.

"(4) Tumors may be more readily palpated."

The question naturally arises whether, since many people will balk on plain carbonated water as insipid, the same results would not be more pleasantly obtained by inviting the patient to "join" the physician in a coco-cola.

Whilst pelvic irrigations should be employed in all cases of pyelitis which are rebellious to the usual mode of treatment, yet it will be found that as a rule it is only a gonorrheal pyelitis that responds favorably to this plan of treatment.

The still continued practice of giving diuretics in "kidney disease" without any idea whatever of the character or grade of lesion is a relic of the medicine of other days. Those who understand renal disease best are least prone to give diuretics.—*Urological and Cutaneous Review.*

MISSISSIPPI MEDICAL MONTHLY.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

We note in the minutes of the last House of Delegates of the A. M. A. that a delegate from the District of Columbia offered a resolution looking to the amendment of Section 3, Chapter VIII of the By-laws of the A. M. A. and that the resolution was defeated.

This law is as follows, please read it carefully:

"Sec. 3. Effect On Membership Of Removal To Another State.—A member who changes the location at which he practices medicine from the state through whose constituent association he holds membership in the American Medical Association to another state in which there is a constituent association is eligible to membership in the component society of his new location upon the presentation of a transfer card and an official statement that his dues have been paid in full in the society in which he holds membership. He shall forfeit his membership in the American Medical Association one year after such change of location, unless he becomes a member of the constituent association of the state to which he has moved. Provided, however, that if the component society into whose territory such member has moved shall refuse him membership, the member shall be privileged to appeal to the Judicial Council of this Association to determine whether or not he be guilty of any act that warrants the enforcement of the provisions of this section. Pending the decision of such appeal he shall retain his membership in the American Medical Association through his original state association. And provided further, that the term 'the practice of medicine' throughout these by-laws shall be held to mean the offering of service or counsel for the relief of those suffering from abnormal physical or mental conditions."

Look at this a moment. A man moving into Mississippi from, say, Illinois, presents to the secretary of the Clarksdale and Six Counties a certificate to the effect that he is in good standing in the Cook County Medical Society. Under the above-quoted law he must be admitted to membership. Otherwise, if the censors decide adversely, he may appeal to the Judicial Council of the A. M. A "to determine whether or not he be guilty of any act" that justifies the Clarksdale and Six

Counties in declining to receive him. It is not definitely stated that the Judicial Council has the power to force the Clarksdale and Six Counties to take him, but the inference is obvious. Incidentally, would it not be a sight worth a long journey to see the Judicial Council try to force an undesirable proposition on that Delta aggregation?

Suppose the applicant was a negro!

Dr. Green, formerly in the office of the secretary A. M. A. and now in charge of the legislative and publicity work, told the writer last year that it would never be the policy of the A. M. A. to force such an issue. But the A. M. A. law declares that negro eligible. Eligible means "qualified to be elected—desirable" (*Century Dictionary.*) The law simply lies. All the laws ever enacted cannot make a negro a "desirable" member of the Clarksdale and Six Counties—or any other county society in Mississippi.

But passing up this point, and supposing that the A. M. A. had no negro members, the law is still at fault. The right to decide who shall and who shall not be members of a county society rests with the members of that society. Anything tending to the abrogation of that right is vicious in the extreme. All county societies, the nation over, are decidedly lenient in their affairs pertaining to membership, but this one detail, the ultimate decision as to who shall not be admitted to membership, must be absolutely a matter for decision by the individual society.

The secretary of the Mississippi Association is advised that there will probably be a conference of state secretaeries in Chicago in February and that one of the duties of that conference will be to elaborate plans for carrying out the provisions of the by-law we have quoted. It is hardly necessary to define in detail the stand he will take should such be the case, but in order that his hands may be upheld we invite correspondence on the subject from individuals and from county societies.

Society Proceedings.

Clarksdale and Six Counties Medical Society—Eighty-seven physicians were in attendance at the meeting of Nov. 5th., the largest in the history of the organization. Fifteen physicians from Memphis attended.

The following program was given and provoked general and varied discussion:

Afternoon Session.

1. Statewide Drainage—T. M. Dye, Clarksdale.
2. Decapitation—W. T. Harris, Rich.
3. Sciatica—A. J. Jagoe, Clarksdale.
4. Headache—T. G. Hughes, Clarksdale.
5. A Bulgarian Bacillus Baby—J. W. Gray, Clarksdale.
6. A Case Absolutely In Point—F. M. Brougher, Belen.
7. The Past And The Present—H. C. Buck, Friars Point.
8. Diagnosis And Treatment Of Malaria In Infants—W. B. Harrison, Mattson.
9. Gonorrhœal Arthritis Treated By A Modern Method—N. Yeates, Jeffries.

Evening Session.

1. President's Address: Harmony In The Profession—J. A. A. Davis, Dockery.
2. Importance of Early Diagnosis—S. W. Glass, Lyon.
3. Surgery Of The Thyroid Gland—L. B. Austin, Rosedale.
4. The Diagnosis Of Malignant Processes In The Larynx—Richmond McKinney, Memphis.
5. The Present Status Of Bone Grafting: Report Of Case—Willis C. Campbell, Memphis.

The afternoon session was devoted wholly to the scientific program, but at the evening session some business matters were also attended to. The following officers were elected for 1914:

President—J. A. Harris, Webb.

Secretary-Treasurer—T. M. Dye, Clarksdale.

Censor—R. L. Mercer, Shelby.

Vice-Presidents—W. F. Ashley, Shaw; H. C. Buck, Friars Point; G. W. Eubanks, Essex; E. L. Robertson, Belzoni; W. A. Prince, Vance; L. L. Minor, Hollywood.

The following new members were elected: W. M. Biggs, Rome; S. F. Neal, Marks; W. R. Harris, Swan Lake; B. H. Higdon, Sunflower; C. M. Chilton, Gunnison and J. C. Gathings, Parchman. Dr. A. J. Jagoe, Clarksdale, was unanimously elected to life membership, the second time such an honor has ever been conferred by the society.

A collection of fifty dollars was taken for a needy brother physician who is in Asheville, N. C., undergoing treatment for tuberculosis.

The following was the menu at the banquet served at the Railroad Hotel following the evening session:

Blue Point Oysters,

Olives, Radishes,

Broiled Spring Chicken,

Saratoga Potatoes, Lettuce and Tomatoes,

Shrimp Salad,

Rocquefort Cheese Bent Crackers,

Demi Tasse,

Cigars,

"Down Where The Wurtzberger Flows."

T. M. Dye.

Meeting County Health Officers.

DR. T. M. DYE,

CLARKSDALE.

The meeting of County Health Officers in Jackson on October 28-29, made clear at least one thing, that the State Board of Health is keeping close tab on all county health officers and that the county officer is under allegiance to the parent Board. Roll call was had at each session and those officers not answering "Present," were sent a formal note asking "Why?" The State Board argues that if an officer is derelict in attending to this regulation of the Board (attendance upon the annual meetings) the question naturally arises "Is he diligent in carrying out the Board's regulations back in his home county?"

The special feature of this meeting that was fruitful of most good to the individual officers was probably the series of "experience meetings," which were a feature of each session. Practically every man present engaged in these general discussions, telling wherein he had succeeded or had failed, the supposed reasons for these successes or failures, the sum total of which proved a splendid schooling for the men present.

Following an introductory address by Dr. Galloway, Secretary to the State Board, explaining the reasons for the call of the meeting, a permanent organization was effected by the election of Dr. W. S. Leathers as Chairman, and Dr. Galloway, Secretary.

Dr. W. H. Rowan, Chief Sanitary Inspector, gave some experiences in different courts of the state in trying infringe-

ments of the sanitary laws. He outlined the method of procedure in mayor's and in magistrate's and in circuit courts.

Under the general caption of "Co-operation As A Factor In Efficient Health Work," Drs. Young of Grenada, Sutherland of Benoit and Jones of Brookhaven, read delightfully helpful papers, outlining the work of the Health Officer in relation to the County Medical Society, the agencies that may be employed in city and in country districts, and the best methods of securing co-operation. Mayor Taylor of Jackson joined in this discussion of co-operation, laying special stress upon the benefits that may be had when the mayor is in sympathy and accord with the health regulations of the city and state.

Dr. J. J. Haralson's paper on the "Ethics Of Health Publicity," was a masterpiece of English prose and syllogistic reasoning, however much some may differ with some of his conclusions. Dr. Willis Walley, being editor, publisher and advertising manager of a county weekly paper, was in the very best possible position to get the best use of the press in promoting health problems and sanitary regulations, and this he did, but it is hardly possible for every county officer to use the press as effectively as did Dr. Walley. Dr. Wood of Panola, because of unusual friendly association with women's organizations, accomplished much through these media. He struck the key-note for doing things when he got the ladies interested.

Drs. Priestly and Donald outlined plans for interesting school children in sanitary matters, and through the children the grown-ups. This is a large field and offers many opportunities, and the manner in which the problem was discussed indicates that most county health officers are alive to the situation. Dr. Percy Wall's paper on "Medical Inspection Of Public Schools," appealed more specifically to those counties in which there are large towns. Dr. Wall's experience in Jackson and his observation in other cities give him a wide knowledge of what is essential to make inspection that really inspects.

Dr. Brown read a very interesting essay on "The Use Of The Agencies Of The State Board Of Health By The Local Health Officer." Dr. Dye "flew the coop" and, instead of following the program as printed, called attention to a pet plan of his, the drainage of artificially created pools of stagnant water, the object of such drainage, of course, being the elimination of the mosquito.

Drs. Hood and Watkins discussed vital statistics, the thing that is giving the State Board and its Secretary so much

trouble just now. Dr. Hood confined his remarks more to morbidity reports while Dr. Watkins gave some very hopeful figures on the gathering of mortality statistics since the vital statistics act became operative.

Municipal inspection and rural sanitation were thoroughly discussed by Drs. Stone, Elliott, Stanley, Aikman, Sanders, Carr and Garrison. Dr. Stingily of the Bacteriological Laboratories explained fully, and with much profit, the best methods of sending speciments to the laboratory for examination. Dr. Gurney talked entertainingly of the diagnostic value of blood smears, while Dr. Arledge spoke of the relation of the county health officer to the State Board Laboratory.

The two talks of Dr. Evans were all that were expected, brilliant, pointed and full of food.

Book Reviews.

DIAGNOSIS OF THE MALIGNANT TUMORS OF THE ABDOMINAL VISCERA by Prof. Rudolph Schmidt, Professor of Medicine in the University of Innsbruck. Authorized English version by Joseph Burke M.D., Buffalo, N. Y. Rebman Co., 141-5 W. 36th St., New York. Price $4.00.

The reviewer does not recall having seen anything in any way approaching this book of Dr. Schmidt's which is quite in a class by itself and could not have been conceived, far less executed, by any other than a master in abdominal diagnosis. He is conservative in the extreme and his hints and directions as to those methods that will overcome difficulties and bring out special points in diagnosis are a rich field of information. One is impressed from the outset with the consistency with which he clings to simple methods and substitutes careful, painstaking examination for elaborate laboratory technique. The illustrative case histories generally include the findings at operation and not infrequently at autopsy, on account of the fact, as is expressed in the preface, that most cases of cancerous diseases reach the clinic when it is too late. It is for this very reason, and to prevent such delays, that the general practitioner is even more interested in such a book than is the surgeon.

E. F. HOWARD.

THE MEDICAL AND SURGICAL REPORTS OF THE HOSPITAL OF THE PROTESTANT EPISCOPAL CHURCH OF PHILADELPHIA.

A book well compiled from the various clinics of this hospital. There are over 400 pages of reports and drawings which well illustrate the work of an efficient and thoroughly up-to-date institution. The chapters on tetanus, the significance of blood pressure, fractures of the forearm, the last named with 23 skiagraphs, are excellently written and show the modern methods used in the hospital. The chapter on fractures of the patella is well worth anyone's reading and the one on the tonsil too needs mentioning. In all the work shows what an immense amount of good this institution is doing by its capable staff and its modern methods.

The editor, Dr. Astley P. Ashhurst, shows a master's hand in its compilation. I hope to be able to read the forthcoming editions of this work as they are given out from the press.

S. W. JOHNSTON.

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*SURGERY OF THE THYROID.

L. B. AUSTIN M.D.,

ROSEDALE.

I wish to bring this subject before the Society, because I believe that the diseases of this gland are on the increase, and an early diagnosis of so much importance. It is a well-known fact that the gland has a marked sexual relationship and we believe that it may be a factor in the disturbances which occur at certain periods, especially in females, as the well-known goiter of adolescence and not infrequent enlargement during pregnancy.

In order that we may understand the diseases of the thyroid body we must take up the histology first. This is a ductless compound tubular gland, and consists of two large lateral lobes united by a narrow band, the middle lobe or isthmus. The organ is surrounded by a capsule that sends in trabeculæ, which divide the gland into lobes and lobules; each lobule is composed of a number of short tubules, sometimes called follicles, each tubule is lined by cuboidal epithelial cells that rest upon a basement membrane; outside of this is the intralobular connective tissue that supports the blood vessels. In the tubules is seen a peculiar homogeneous substance, the colloid material that is the result of the activity of the cells blood vessels and dense plexuses are formed around the tubules. The colloid material represents an internal secretion that is absorbed by the blood vessels.

The diseases of the thyroid are divided into three classes: those of the connective tissues, those of the blood vessels, and those of the parenchymatous tissue.

In interstitial thyroiditis we have a condition due to an infection of the connective tissue, and the lymph spaces between the connective tissue, associated with any of the infectious diseases, such as tonsillitis, typhoid, influenza and scarlet fever. In the acute stage there is a hyperplasia of connective

*Read before the Clarksdale and Six Counties Medical Society.

tissue and the gland is enlarged and sensitive. There is an elevation of temperature and the patient is often delirious. In the acute stage there are none of the symptoms that are associated with Graves' disease, such as excessive absorption of the thyroid secretion. When the inflammation of the gland subsides the same tissue changes occur as in atrophic schirrosis of the liver, there is cicatricial contraction of an excessive quantity of connective tissue, which in turn, causes strangulation of the specific thyroid cells, this destroys the secreting power of the cells which causes the development of myxedema. The treatment of this condition is medical.

As to the second class of cases, we have a dilatation and hyperplasia of all the vascular elements in the thyroid and the result is a large pulsating thyroid, without any symptoms of hyperthyroidism; a large portion of this type of gland should be removed.

The final, and most important lesions are those that involve the acini and the epithelial cells and their basement membrane. Under this classification we have six conditions: colloid goiter, cystic goiter, adenoma, exophthalmic goiter, malignancy, syphilis.

The normal secretion of the thyroid is colloid material; this secretion is sometimes excessive, and is stored in the gland without producing any symptoms of hyperthyroidism; this condition is called colloid goiter. The gland attains considerable size and is fixed. The patients do not respond to medical treatment and it becomes necessary to remove a large portion of the gland. The cystic goiter is due to an execessive secretion retained within a distinct tubule; this becomes encapsulated and the pathology is practically the same that of an ovarian cyst. The character of the secretion is changed from a colloid material to a serous material, and we have the development of serous cysts which often attain a large size. A cystic goiter when multiple may be recognized by the smooth hemispherical, close-set, elastic nodules upon the surface; when single and larger by fluctuation. The treatment of this condition is strictly surgical, all the thyroid extract, iodine and asenic will contribute nothing to the cure of this disease.

The first goiter that I ever operated on was one of this kind. The patient was a colored female, thirty-eight years old. She entered the Mississippi State Charity Hospital in 1908, because of an enlargement of the thyroid gland, difficult breathing and hoarseness. Six years previous to admission she had a miscarriage and was sick in bed for four or five months, had

a profuse discharge of pus from her vagina, had fever during the entire time, and suffered considerable pain in the region of her right tube;; this condition gradually subsided and she apparently recovered. A few weeks afterwards she noticed a slight enlargement in her neck. She never menstruated again and the right side of her neck continued to increase in size. She was admmitted to my service in May 1908. I knew nothing about goiters then, and I supposed that thyroid extract would cure any goiter like magic. I gave her all there was in Vicksburg and in addition to that I gave her iodide of potash and Fowler's solution in increasing doses. This treatment stimulated the thyroid to secrete more fluid and it all seemed to accumulate in the right side. By this time the patient was in a pretty serious condition; the cyst was so large that she could hardly breathe. I removed the cyst together with the right lobe of the thyroid, and in a few days she was well, and could talk and breathe in a normal way.

An adenoma of the thyroid is a circumscribed hyperplasia of normal gland tissue. The development of these nodules may in certain instances give rise to hyperthyroidism and, therefore, should be removed.

To my mind exophthalmic goiter is the most important type of goiter that we have to deal with. The surgical history of this disease was extremely meagre until Theodore Kocher demonstrated that the operation of thyroidectomy could be done without any great danger, if done at the proper time.

Mœbius supplied a most important element for the rational surgical treatment of exophthalmic goiter by his logical and convincing studies, which made it clear that in this disease there is absorption of an excessive amount of substance secreted by a diseased gland.

In this as in most other instances, the benefit of operative treatment was discovered accidentally.

The size of the gland is rarely an important feature.

One case gave the following history:

S. B., colored, female, aged twenty-three. Family history negative.

Personal History: began menstruating at the age of fourteen. Menstruated every twenty-eight days, lasting three days. Does not remember to have ever been sick before in her life. Her menses stopped in March 1912. After this she began to suffer from headache and severe pain in her eyes.

Physical examination, seven months after onset of symptoms: exophthalmos, pulse 120, heart enlarged, no enlargement

of the thyroid, lungs normal, muscular tremors marked. The least excitement would cause her heart to beat one hundred and forty, which of course would cause some dyspnœa.

Vaginal examination: uterus in normal position, movable, and not enlarged; ovaries and tubes were not palpable; no tenderness anywhere in the abdominal region.

Urine: specific gravity 1015, slight trace of albumin, no sugar, trace of indican, total acidity 30. No hyaline or granular casts, temperature 98.6.

September 18th. 1912. I removed the right lobe of her thyroid, which appeared to be about the normal size. Seven days after operation she began menstruating and has never missed a month since.

I sent a section of this specimen to Dr. Krauss and he gave me this report:

Memphis, Tenn., Oct. 28th. 1913.

Dr. L. B. Austin.

Rosedale, Miss.

Dear Dr. Austin—Sections from various portions of thyroid gland submitted to me, show a mixed condition—some of the acini are dilated with colloid, the lining epithelia being flattened out from pressure. *Those are inactive.*

Other areas show active hypertrophy with polypoid intracanalicular growth and round cell infiltration. *These are areas of typical hyperthyroidism.*

Some sections show both conditions in the same low power field, and still others show a condition intermediate between the two.

This gland would probably not have quieted down if treated expectantly, and the hypertrophy might have progressed beyond hope if operation had been delayed.

Yours very truly,

Wm. Krauss.

The symptoms are very numerous and by no means the same in every case. The most important symptoms and signs are: prominence of the eyes; tachcardia, the pulse is abnormally frequent and quick, usually of high tension, and extremely irritable; the heart beat is forcible; there is dilatation, sometimes occurring only during excitement and after exertion, or increased by these conditions; muscular tremor; muscular weakness; nervous excitability; mental deficiency; vertigo; in directing the eye downward the lower margin or the upper lid does not follow the line of vision normally but lags behind or

follows in an irregular spastic manner (G); retraction of the upper eye-lid and at the same time the lid remains much more stationary than it does under normal conditions; there is also a marked decrease in the frequency of winking. (S.)

Operation should be advised in all cases of exophthalmic goiter as soon as the diagnosis is made. There is no medical treatment for these cases and delay means that a degeneration of the heart muscle may take place and the patient will have passed the operative stage before reaching the surgeon.

As regards malignancy will say that I have seen one case associated with a case of carcinoma of the breast. I removed the breast and intended to remove the thyroid but she was in such a poor condition that I did not do so. She lived eighteen months and died from a recurrence of the cancer of the breast.

Syphilis: I have only treated one case of syphilis of the thyroid. This was a colored female who gave a history of having a chancre six months before I saw her. She said she had taken practically no treatment and the chancre healed without any trouble. She had an unmistakable syphilitic eruption on body and limbs, and all the glands of her neck were enlarged including her thyroid. She was given one one-hundreth grain of red iodide of mercury intravenously once each week for five consecutive weeks, all the lesions disappeared and the patient refused to take any further treatment.

I have operated upon sixteen cases of goiter with no deaths but I attribute my success to the class of cases that I have accepted and not to my skill as a surgeon.

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*KIDNEY TROUBLE AS A SEQUEL OF TONSILLITIS.

TOBE RIDDELL M.D.,
DUBLIN.

I have recorded a few cases of tonsillitis with nephritis as a sequel. Nine out of the twelve cases I have recorded had albuminuria, and three of these nine, microscopical examinations warrant a diagnosis of nephritis, varying in form.

The following is a report of the three cases above mentioned:

Case 1: M. J., negro girl, age seventeen, came to me Jan. 5th. complaining of sore throat. She gave history of having had an attack three months previous. On examination of the

*Read before the Clarksdale and Six Counties Medical Society.

throat I found the left tonsil very small; no doubt had gone through an atrophic change from the previous attack. I found the right tonsil red, swollen and congested, with all of the signs of an inflammatory condition, three visible crypts filled with whitish plugs of inflammatory exudate, and a constitutional febrile reaction; general constitutional appearance showed a high state of toxemia. She stated that her kidneys had acted five or six times during the past three hours. I made a diagnosis of acute tonsillitis, gave her the usual treatment and asked her to send me a specimen of urine the following day, which request was complied with. On examination of the urine I found heavy clouds of albumin. I again examined it on the 7th. and on the 8th. and after examination on the 8th. I mailed a specimen to the State Bacteriological Laboratory.

In a few days I received the following report:

Specific gravity,	1030.
Color,	Amber.
Reaction,	Alkaline.

No indican.

No sugar.

Heavy traces of albumin.

Microscopical examination: hyalin, coarse and fine granular casts; amorphous urates; uric acid crystals in abundance.

I treated this tonsil until Jan. 15th., at which time I did a tonsillotomy. On the 28th. I examined the urine and found it normal, sent a specimen to the Laboratory and they affirmed my findings.

Case 2: Mrs. F., white, age thirty-one, came to me complaining of tonsillitis; had had it only a few hours. I examined her throat and found the whole area of tonsils covered with swollen red and congested membrane. Temperature and respiration normal; pulse 86. She complained of urinating six or eight times during the night before. I gave her treatment for tonsillitis, examined urine and found specific gravity 1030, color amber, acid reaction and heavy with urates.

I sent a specimen to the Laboratory and they reported normal except large crystals of uric acid. That evening she had a distinct chill, after which she had a temperature of 103⅖ F. Two days later I saw the patient; her tonsils were still inflamed. She said that her throat was very much better, but she could not see any change in her kidneys.

I again obtained a specimen of her urine, examined it and

found albumin in abundance. I then sent a specimen to the Laboratory and they gave report as follows:

Albumin,	Present.
Reaction,	Alkaline.

No sugar.

No indican.

Microscopical: hyalin, coarse and fine granular casts; coarse crystals of uric acid.

I treated this patient for about eight days, resulting in a complete recovery from the tonsillitis. Five days later the urine cleared up and the kidneys became normal.

Case 3: negro man, age twenty-eight, came complaing of a tickling in his throat; said he thought that possibly a crumb of bread had lodged there. He gave a history of having had syphilis.

On examination, I wound all the landmarks of a syphilitic his tonsils having three or four syphilitic ulcers on them. I made diagnosis of syphilis and told him of the treatment that might be pursued. He protested against the idea of being treated for syphilis, giving as his reason, that he had been cured and just wanted something for his throat. I then painted his tonsils with bichloride of mercury and alcohol solution. Being interested in the sequellæ of pathology of the tonsils from all causes I asked him for a specimen of urine. Examination of urine revealed the presence of albumin. I immediately sent a specimen to the Laboratory and received the following report:

Specific gravity,	1028.
Color,	Dark straw.
Reaction,	Alkaline.

No indican.

No sugar.

Microscopical examination: tube, granular and epithelial casts; crystals of uric acid.

After treating this patient with a mercury solution twice a week for four weeks the albumin disappeared. I then sent another specimen to the Laboratory and received a report of urine being normal.

Now this patient had absolutely nothing in the way of treatment but the mercury solution twice weekly sparingly applied to the tonsils.

As I have said, three of the series of twelve cases gave sufficient evidence to warrant a diagnosis of nephritis. All of the cases of albuminuria, being nine, that I saw early had excesses

of uric acid and afterwards a development of albuminuria.

It is very suggestive to me that pathology of the tonsils causes the uric acid through error of the secretory system or otherwise; the uric acid causing the discord in the kidneys.

*GASTRO-INTESTINAL INTOXICATION.

B. C. TUBB B.S., M.D.,
SMITHVILLE.

Gastro-intestinal intoxication is of vast importance to the general practitioner for several reasons: its occurence every year, its high mortality and the obscurity of its causes.

While this disease claims many victims each year, we have only been studying the condition about thirty years, and the laity for a much shorter period, and we have not located the exact cause. Some claim it is due to milk, some to heat and others to bacteria or toxins.

We know that milk contains many bacteria, both pathogenic and non-pathogenic. Of course the pathogenic bacteria do harm, and many of the non-pathogenic bacteria cause changes in the milk which render it unfit for food, and the most violent attacks of poisoning are seen in patients who have eaten milk of milk products, producing symptoms similar to those of gastro-enteric intoxication. We sometimes find hay and potato bacilli which form very resistant spores, which cannot be killed by ordinary methods of sterilization, and unfortunately during sterilization the milk undergoes some alteration which causes it to disagree with the patient.

We see the disease in damp, warm and hot weather, but we don't know whether it is because this weather is most suitable to the growth of the germs in milk and food, or whether it is some influence heat has on the mechanism of the body, but we do know the disease is aided, if not produced, by heat.

Some cases of the disease are very mild, with very little gastro-enteric disturbance, others begin as mild cases and gradually grow worse, but the physician rarely sees these cases as the mother usually attributes the trouble to teething or an attack of the so-called "hives," and proceeds to drench with teas and soothing syrups until the patient is far beyond hope and the doctor, with all his skill and remedies cannot reachh it.

*Read before the East Mississippi Four County Medical Society.

There may be only symptoms of indigestion, with vomiting, and some diarrhœa, and after thorough elimination the temperature falls, vomiting ceases, the child retains food and drink and is soon on the road to recovery.

But the cases to be dreaded are those which come on suddenly with vomiting and purging (and worse still are those cases with apparently obstinate constipation), constant thirst, water, medicine and everything swallowed vomited as soon as it enters the stomach, and frequently watery discharges which contain undigested food and some fecal matter.

This profuse drainage from both stomach and bowels causes the patient's body to waste and dwindle with surprising rapidity, and in only a few hours the eyes grow hollow, nose sharpe and the cheeks fall in, flesh is gone, and the child looks old and feels flabby.

The temperature is usually high; we have seen several cases with a temperature of 105° F., and some cases even 106, and one case with temperature of 108 under the arms with these high internal temperatures the surface is cool and clammy and the extremities cold.

The child is usually restless, throws its hands and feet about, rolls its head and often attempts to cry, but is not heard. The eyes are rolled up and half open. The patient passes into convulsions or coma, vomiting ceases, bowels checked an dusually become distended with gas and the child soon dies, unless we secure elimination and conditions change.

Sometimes we leave these patients improved and apparently on the road to recovery and return only to find the conditions even worse than at first. Then we know the patient has been fed, but the nurse and mother know nothing of it, unless the patient recovers; then they tell us the secret, saying the patient would have died, had it not been for feeding it, though if death ends the scene, they bury the secret and blame the doctor.

We believe nearly all these cases can be prevented, or at least made milder by instructing mothers on preventive measures, and the mortality rate reduced from thirty per cent. at present to almost nothing, closing up many graves, wiping away mothers' tears, making fathers rejoice and homes happy and increasing the population of our own nation.

The United States government has spent years and millions of money trying to regulate foreign immigration, and say who shall, and who shall not, enter our country, when, if had spent only half that time, and half those million in saving and

protecting the lives of children, born within its borders, it would need no foreign immigration. With the time and money spent on trees, forestry and cleaning non-navigable streams, Congress could instruct mothers to give their children fresh air, have regular times to feed, how much to feed, how to select and prepare suitable foods and improve hygenic conditions and many other things to reduce the present high mortality rate.

But it seems that things are growing worse in place of better. Mothers are now parading streets, destroying cities and even taking the lives already fortunate enough not to flicker out from their neglect in tender years. Woman suffrage is a sure thing. Then with mothers interested in and excited over politics, neglecting home to elect friends and attend elections, what will the end be? Will we in the future, as retiring physicians, proudly point with a finger of dignity, back to the twentieth century saying that then our mortality rate was only thirty per cent? Only time can tell.

*A BULGARIAN BACCILLUS BABY.

J. W. GRAY M.D.,
CLARKSDALE.

When Grigoroff of Geneva isolated the true "Bacillus lactis bulgaricus" from Bulgarian soured milk, I believe he conferred a boon of inestimable value upon all bottle-fed babies.

To Dr. Ralph Oakley Clock, of New York, belongs the credit of placing this method of treatment upon a solid foundation, and demonstrating its immense superiority over all other methods, and I feel that I can do no better than to quote his conclusions, drawn from a series of one hundred and thirty-nine (139) cases of infantile diarrhœa, and read before the New England Pediatric Society.

The most impressive facts, which stand out boldly as the result of this method of treatment are:

The gain in weight, in spite of the number of stools.

The rapid change in color of the stools to yellow.

The rapid subsidence of fever.

Absence of mucus and blood from the stools at the end of forty-eight (48) hours.

The fact that the hygienic surroundings of the patients and the degree of intelligence of the mothers had no influence on the results.

*Read before the Clarksdale and Six Counties Medical Society.

A starvation diet, accompanied by purgation, is productive of loss of weight and strength, and serves to prolong the course of the disease; and further, such a procedure can no longer be advanced as a rational method of treating infantile diarrhœa.

The digestive powers in infantile intestinal conditions, even when associated with fever, are not so impaired as to prevent the digestion and assimilation of a milk diet. This fact is corroborated in typhoid fever, where the high caloric diet, in contrast to the starvation diet, has reduced the mortality to a remarkable degree. Moreover, the cases herein recorded prove the value and rational of continuing a milk diet in infantile intestinal conditions, as illustrated and emphasized in the diagram of the weights.

In severe cases, best results are obtained by administering a large number of the tablets during the first two or three days of the treatment. As many as forty-two (42) bulgara tablets in twenty-four (24) hours have been given to very young babies without untoward effects.

The implantation method of treatment has progressed beyond the experimental stage, and the results of its use can no longer be questioned or disputed. This treatment has been proved of practical, clinical and scientific value; and its simplicity should appeal to every practitioner.

In order to secure the best results, in using the implantation treatment, a pure culture of the true bacillus lactis bulgaricus must be employed; otherwise disappointment will follow. Basteriologists recognize the fact that the same organism, isolated from different sources, will vary in its virulence and in certain other characteristics; and the baccilus lactis bulgaricus is no exception to this rule. While similar organisms have been isolated from the soured milks of several Easteru countries, namely, Russia, Egypt, Armenia, Syria, etc., yet the bacillus isolated from Bulgarian soured milk have been proved to possess the greatest antagonism to putrefactive bactria. Moreover, in using a culture of this organism for implantation treatment, it is essential that the culture show only viable organisms and that these be present in sufficiently large numbers. Without doubt, it has been the lack of a pure active culture of this bacillus in viable form that has been the cause of the different results obtained in previous years with lactic acid bacterial therapy.

Just here I will state that about four or five years ago I tried this same method of treatment with some so-called bacil-

lus lactis bulgaricus tablets with absolutely no good results. I am now satisfied that the fault was in the tablets.

During the past summer, I have treated ten (10) cases of infantile fermentative diarrhœa by this method, and the results have been brilliant.

While I have always thought an intestinal antiseptic to be an "iridescent dream," I now believe that the implantation of pure cultures of bacillus lastics bulgaricus will at least restore the intestinal bacterial flora to normal.

The cases treated ranged from chronic intestinal indigestion to entero-colitis, and while I did not have the courage to withhold the initial calomel purge in the more toxic cases, there was absolutely no medication other than the administration of one (1) to three (3) tablest of bacillus lastic bulgaricus before each feeding.

The baby we have here to-day is a beautiful example of the efficacy of this treatment.

At birth she weighed seven and one-half (7½) pounds.

In spite of every effort the mother failed to give sufficient milk for her, and I was forced to put her on the bottle.

At two (2) months old, she weighed eight (8) pounds, and though the food had been changed a number of times, the bowels were constantly deranged, the movements running from twleve (12) to twenty (20) in twenty-four (24) hours, with much straining and blood and green mucus. At this time two (2) tablets of bacillus lactis bulgaricus were given, in a little sugar water, before each feeding, and without any further change in food, which consisted of condensed milk and a cereal broth, immdeiately improvement began and has continued.

She now weighs fifteen (15) pounds at five (5) months old, bowels are absolutely normal, and she is about as healthy a baby as one would care to see.

Current Literature.

THE CONVENTION OF DISEASES.

We attended one of the great national gatherings of the profession recently and took in all the sessions that we could. So surfeited did we become with the interminable talk that one afternoon, as some estimable gentleman proclaimed the virtues and defects of salvarsan in somnifacient monotone, we slipped

down a plane or two from the conscious, and suddenly found ourselves in a convention of diseases.

Here, strange to say, we found the usual conditions completely reversed. The diseases were discussing the medical profession, its aims and methods and results, as well as the possibilities held by the future both for physicians and disease.

The convention hall was crowded with diseases and bacterial proxies. Most of the diseases gave a venerable impression, but here and there flashy young diseases, like pellagra and the sleeping sickness, were to be seen. Tuberculosis presided, with cancer occupying a place of honor on the dais. Flitting about the hall we observed many Cohnheim cells with metastasis licenses conspicuously displayed. Syphilis wore a curiously designed robe, which upon close inspection we saw bore side-chain figures, woven out of amboceptors and complements. Acting as a kind of chief usher, or master of ceremonies, was Alcoholism, who seemed to be popular with everybody. The greetings between Alcoholism and Arteriosclerosis were particularly effusive.

Proceedings opened with an address by Tuberculosis. In the course of the address Tuberculosis expressed somewhat optimistic views. Despite the feverish activities of the crusaders there was much to be thankful for. Thus the phthisiophobia which had been engendered through an overreaching campaign had led to much inhumanity on the part of fear-inspired relatives toward the victims, and Tuberculosis was glad to say that while the mortality had perhaps been lessened there had been compensations. Then, again, there was still much congestion of population in the big cities, and certain interests could be counted upon to perpetuate this state of affairs. An instance was cited where the head of a great corporation directly interested in crowding three thousand people into each acre of its city property was the president of the charity organization society. These things were most encouraging and it could almost be hoped that the disease would gain its old ascendency once more. There were many things about the existing social order and the capitalistic exploitation of the industrial classes which also gave ground for future hope. Upon the whole, Tuberculosis saw but little reason for pessimism.

Typhoid Fever, speaking for the whole class of preventable diseases, thought the immediate outlook fairly good but sounded a note of warning for the future. Much was to be feared from the constantly growing enlightenment of the people and the persistent efforts of medical educators. Much encouragement

was to be derived from theactivities of such bodies as the Leagne for Medical Freedom, the anti-vivisectionists and the anti-vaccinationists. A National Department of Health was the thing mostly to be feared, and Typhoid Fever confessed that its foundation seemed inevitable. It would probably be a wise plan for the preventable diseases, instead of working far afield, to concentrate their energies toward "getting" such enemies as the A. M. A. propagandists, particularly the public lecturers.

Acute Rheumatism spoke in a rather cheerful vein. The damp and insanitary houses and working quarters of the poor were supplying a plethora of victims, as always. These people, after discharge from the hospitals, were perforce obliged to resume their old habits of life, and could usually be depended upon to suffer recurrences. Nor had any great advance been made in the therapy of the disease. It was true that cardiac complications were perhaps not so common, owing to the enforcement of prolonged rest, or even fixation, as in children, but still there was no end to the mischief worked in the hearts of the victims. This, after all, was Rheumatism's chief aim, and by it must its usefulness be judged.

The Venereal Diseases were perhaps the merriest among all the attendants of the Convention. Gonorrhœa, their spokesman, could see no immediate likelihood of the passing of prostitution, public or clandestine, nor any probability of society putting its economic and moral house in order for some time to come. The age at which young girls seemed to be falling out of the impossible industrial struggle into the ranks of the courtesans was constantly lessening, until now mere children were on the streets in increasing numbers. The value of prophylactic measures was understood by few physicians, seemingly, though the Philippine army surgeons had tried them out with great success. The boards of health could be trusted not to educate the public along such lines, for reasons too obvious for discussion. Incredible as it might seem, many general practitioners neglected prophylaxis against ophthalmia neonatorum. The therapy of gonorrhœa could hardly be said to have been signalized by and great advance, though the spokesman confessed to considerable discomfiture upon the few occasions irrigations after the Harrison-Houghton method, as described by them in the *Journal of the Royal Army Medical Corps* for February.

Diabetes reported, grumpily, some recent disagreeable experiences with massive doses of *Bacillus lacticus bulgaricus*.

This treatment had caused it more concern, to say the least, than any it had yet encountered. Aside from this there was but little cause for complaint; indeed, the disease was distinctly on the increase among certain classes of citizens.

The many diseases due to the colon bacillus all tried to talk at once against the pernicious activities of certain physicians who had waged successful war against them with hexamethylenamin and sodium benzoate in combination. Thus they had been obliged to retire from the gall-bladder, the kidney, the blood, the urinary bladder, the ureter, the ovary and Fallopian tube, the lung and the cervix uteri. Even Urinary Incontinence in Children had a sad story to tell.

Pneumonia was sorry to say that since the more or less useless ammonium salts, used with fatuous faith by the profession for so many years, had been replaced by calcium chloride it was having greatly increased difficulty in effecting the demise of patients.

The Poisonings were too busy to be present but sent a report to be read by the secretary in which they reported a hitherto unsuspected recruit in the shape of Magnesium Sulphate, which Boos, of the Massachusetts General Hospital (October 1911, *Publications*), had shown the profession to be really toxic. Still, the laity could be depended upon to keep on using the stuff.

Appendicitis was feeling very happy and prosperous, thank you. The high operative mortality at the Massachusetts General Hospital was cause for felicitation. Conservative medical treatment of colitis, Appendicitis was glad to say, was growing less and less popular, despite the repeated warnings of Beverly Robinson and other reactionaries, and the appendix would continue to be removed more and more. The surgical progressives had the inside track and the whip hand and there was little to be feared from the ultraconservatives. The devil and the gods of disease were to be sincerely thanked for keeping up the heresy hunt against these reactionaries.

The Diseases of Childhood, represented by Malnutrition, seemed to be obsessed by fears proceeding not so much from the direct activities of the medical profession, tremendous though they were, as from those of the social reformers, agitators like Ellen Key and the advocates of small families, and the constantly growing army of enlightened mothers and restless, if not fully emancipated, women who were beginning to see what their proper relations and responsibilities in the social scheme should be.

At this point we began to look around the hall to see if our old friend, "A Complication of Diseases," was in attendance. But the meeting suddenly broke up in confusion, due to the unexpected appearance of a body of shoo-fly cops, made up of opsonins and antitoxins. We awoke just in time to catch the last words of the lecturer on salvarsan. So the menu which we had read on the Convention's programme was not partaken of, to-wit:

Ptomain Cocktails
Serum, Plain
Muscæ Volitantes Small Round Cells
Bundle of His, Vitreous Sauce
Pineal Croquettes Cilia
Phagocyte Punch
Agar-Agar Pudding, Albumin Sauce Opsonic Ices, all Strains
Lady Fingers Casein Nodes
Caffein Cordial

A. C. Jacobson,
In *Long Island Medical Journal.*

Obituary.

Dr. T. M. Crosby of Neshoba, died Dec. 17th, 1913. Dr. Crosby was born in Garlandsville, July 3rd, 1861. He was educated at Harperville College and studied medicine in Mobile, Ala., receiving his state license in 1889. He practiced at Beech Springs eighteen years before moving to Neshoba. At the time of his death he was vice-president of the Newton-Neshoba-Winston County Medical Society.

Under the auspices of the Georgia Surgeons Club, a sixty-days' tour of the surgical clinics of Europe is being arranged for representative Southern surgeons, to wind up at the meeting of the Congress of Surgeons of North America in London the latter part of July, 1914. Those interested may secure details of the trip from Dr. R. M. Harbin, Secretary-Treasurer, Rome, Ga.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

The end of the fiscal year is a good time to "take stock" in any line of business and if physicians would but follow the example of other business institutions they would undoubtedly serve themselves and their patients to better advantage. There are so many things for a doctor to consider that he gets out of the habit, so we venture a few suggestions.

In the first place, doctor, have you kept up in a reasonable degree with the progress of your profession? Have you devoted a fair amount of time to conscientiously studying the work that has been done, and is being done, by the advance guard? Are you better equipped, mentally, than you were a year ago? If not, you have lost ground, for the profession as a whole is going steadily forward. If not, better begin at once.

Have you given your medical organization proper support? By this is not meant the question of dues. That is the smallest part. Have you attended the meetings, taken part in the discussions, given your fellow-practitioners something of *yourself?* To do so is to help yourself even more than you help them; to fail to do so is to fail in a distinct duty. If not, better begin at once.

Have you done the square thing by those dependent on you by conducting the business end of your occupation in a way, that will not leave them penniless should you be suddenly "called," never to return? If not, better begin at once?

Have you given to those who are in destitute circumstances the same care and attention you have given the "best fixed" of your clientele; not the "bum" and the "beat," but the widow and orphan at whose door the wolf prowls? There are some of

them, and they have a native pride that shrinks from asking service for which they cannot pay. Have you "passed them up" or remembered that when the final balance is struck you may need a credit of this sort? If not, better begin at once.

Have you considered how you yourself might have acted if placed in similar circumstances, under the same conditions, as the man with whom you have had a disagreement? Have you considered his side of the case and analyzed your own words and actions and studied them from his point of view? Have you recalled the adage "It takes two to make a quarrel," and remembered that the other fellow, by himself, is only one. If not, better do it now.

The State Association enters the new year in better condition than ever before. Of the four counties that had no organization last year, two have already come into the fold and one of the others is practically assured. This assures a material gain in membership, which in 1913 was by a good margin the largest in our history, and, if the old organizations show anything like the gain that they have averaged in the past two years, will carry us to the eleven hundred mark. Considering that a fair estimate puts the total of physicians in Mississippi at eighteen hundred, and that this includes irregulars and negroes, we should feel fairly well satisfied with our progress.

The work of the Association, while showing along no new lines for 1913, has been a steady advance in the paths already laid out, and, altogether, its members can wish themselves a "Happy New Year" with good grace, feeling that on account of past achievements they deserve it, and, from all prospects they are assured of it.

Society Proceedings.

East Mississippi Four County Medical Society met at Tupelo Dec. 16th., the following being the program:

Invocation—Rev. John D. Hunter, Tupelo.

Opportunities Of The Physician As A Christian—Rev. John D. Hunter.

A Few Points That A Physician Should Know About Law —Judge W. D. Anderson.

Glaucoma, Prof. E. C. Ellett, Memphis, discussed by Drs. I. P. Burdine, J. H. Green and L. C. Feemster.

Meningitis, Prof B. F. Turner, Memphis, discussed by Drs. Bryan, L. O. Carruth and McMillan.

Tuberculosis, The Physician And The Laity, Dr. H. Boswell, Jackson; discussed by Drs. W. C. Spencer, Victor H. Bean and J. O. Gurney.

Heartaches, Dr. F. J. Underwood, Nettleton; discussed by Drs. T. F. Elkin, H. M. Anderson and C. O. Farrar.

Prof. Buford of Memphis, gave an interesting didactic lecture on "The Nervous Individual."

Officers for 1914 are E. K. Guinn, Prairie, president; E. P. Wilson of Houston, J. H. Green of Tupelo, W. N. Reed of Fulton, I. P. Burdine of Amory, vice-presidents; F. J. Underwood, Nettleton, secretary-treasurer; W. C. Spencer, Verona, censor; W. A. Toomer of Tupelo, G. S. Bryan of Amory, W. N. Reed of Fulton, J. C. Walker of Houlka, delegates; H. M. Anderson of Tupelo, C. B. McCown of Nettleton, J. Nash of Plantersville, A. F. Wicks of Okolona, alternate.

After the meeting a banquet was held at the Hotel Monaghan.

F. J. Underwood.

Marshall County Medical Society has opened negotiations with the physicians of Benton, heretofore unorganized, for the organization of a bi-county society. Prospects are excellent, according to reports, and a material addition to medical organization is confidently expected.

Newton-Neshoba-Winston County Medical Society met at Newton Dec. 9th. and elected the following officers for 1914: President, D. J. Rush, Philadelphia; Vice-Presidents, G. H. McNeill and T. M. Crosby; Sec'y.-Treas., S. A. Majure, Dixon; Censor, T. F. Kilpatrick; Delegates, J. G. Gill, W. H. Mars and T. F. Kilpatrick. The Society has now forty-sevent members and hopes for a material increase during the next year.

S. A. Majure.

Noxubee County Medical Society has reorganized with Dr. J. A. Perry, Shuqualak, president, and Dr. J. M. Stanley, Macon, secretary-treasurer. About half the physicians of the county are members.

S. A. Majure.

Warren County Medical Society has elected Dr. J. S. Ewing president, Dr. I. C. Knox vice-president, Dr. S. Myers secretary-treasurer, Dr. V. Bonelli delegate.

Mississippi State Medical Association

STANDING COMMITTEES.

Public Policy and Legislation.

W. S. Leathers, University; F. M. Sandifer, Greenwood;
R. S. Curry, Jackson; L. C. Feemster, Tupelo;
E. F. Howard, Vicksburg.

Medical Education.

D. W. Jones, Brookhaven; J. W. Young, Grenada;
D. J. Williams, Gulfport.

Scientific Work.

E. F. Howard, Vicksburg; B. B. Martin, Vicksburg;
F. J. Underwood, Nettleton.

CHAIRMEN OF SECTIONS.

Hygiene	J. O. Gurney	Tupelo
Surgery	E. C. Parker	Gulfport
Eye, Ear, Nose and Throat	J. M. Guthrie	Meridian
Medicine	W. D. Beacham	McComb City
Physiology, Pathology and Bacteriology	T. J. Brown	Grenada
Obstetrics and Gynecology	W. J. Grady	Amory
Materia Medica	W. D. Arnold	Ackerman
Pediatrics	T. M. Dye	Clarksdale

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*TREATMENT OF LOBAR PNEUMONIA.

E. W. MACKEY M.D.,
PURVIS.

Pneumonia is an acute infectious disease. The infectious agent, the pneumococcus, is principally eliminated in the sputum. This should be disinfected, destroyed, or both, the same as in pulmonary tuberculosis. This is important. By making this a rule, the prevalence of this dreaded disease, which yearly sends thousands of people to untimely graves, may be greatly reduced.

Since many of the bacteria of this disease are also eliminated through the bowels, especially in children who generally swallow their sputum, and some probably in the urine, it seems rational that the feces and the urine should also be disinfected the same as in typhoid fever, especially if flies be in evidence.

The room which the patient has occupied during the attack of the disease, should be disinfected with formalin before it is occupied by any other person, especially a child, an old person or a feeble person.

From the beginning of the disease the patient should have, as nearly as possible, absolute rest in bed. Every unnecessary movement and all excitement should be avoided. In the room one person at a time to nurse the patient is enough; too much company not only worries and excites the patient but also exposes each indivdual present to infection.

The room should be kept quiet, well ventilated and cool; but not too cold. Placing the patient in a draft should be avoided. Excessive dryness of the air in the sick room must be guarded against. It is well to keep a receptacle containing water on the heater, especially if the room be heated by a stove.

The clothing of the patient and the covering of the bed should be light and comfortable .

The diet should be fluid. Albumin water, albumin lemon-

*Read before the Lamar-Marion-Pearl River County Medica Society.

ade, buttermilk, sweet milk, broths, gruels, etc., are suitable articles. One or more of these, or something similar, should be administered at frequent intervals throughout the course of the disease. Wee should not starve the patient.

As soon as the temperature has returned to the normal, the patient may have soft diet, and then very gradually return to his regular diet.

If the temperature runs high and the nervous symptoms be marked, the fever should be reduced by sponging the face, neck, wrists, and the whole body if need be, with cold water. Water can be used freely without harm. We should not be afraid of it, unless for some good reason it be contra-indicated. Cold sponging is probably better than ice bags to the chest, or cold packs; and its advantage that it can be done by the family is not to be lightly considered. Tub baths are not only impracticable, but they are actually dangerous, especially late in the disease, on account of the heart weakness from myocardial degeneration.

The patient should have plenty of water, lemonade, etc., to drink. The ingestion of fluids reduces the toxemia by diluting the toxins and by increasing their elimination through the kidneys. To keep down the toxemia as much as possible is very important.

While in selected cases normal saline solution may be used subcutaneously or by large enemata, ordinarily these methods of treatment are neither necessary nor desirable.

There is no satisfactory specific treatment for pneumonia. It is one of the diseases which cannot be aborted by any known means at the present time.

The very best results are probably obtained by carefully watching our patients and meeting the indications as they arise.

Such drugs as veratrum viride, tartar emetic, etc., are useless if not positively harmful. The same might be said of acetanilid, antipyrine, phenacetin, and the like. The last three named drugs, in the early stages of the disease, may appear to do much good by relieving the pain and reducing the temperature, but we should not be misled; if they are used at any stage of the disease, they are likely, sooner or later, to result in trouble.

So far as I know, bleeding in the early stages of pneumonia is not practiced here, but it is recommended in nearly all of the text-books. Bleeding pneumonia patients is a per-

nicious practice. It should be vigorously condemned. By blood-letting the patient's resistance is lowered. The scavengers, the leucocytes, are necessarily withdrawn from the tissues with the blood. Part of the patient's fighting force has been taken away from him. The blood pressure is lowered for a very short time. The blood vessels are very soon refilled by absorption of the fluids ingested, and then the blood pressure is as high again as it was before the blood-letting; the heart has the same amount of work to do as before the blood was drawn. Of course the toxins are now more dilute than they were, but this does not compensate for the vital fluid withdrawn. The patient's resistance has been lowered and he is not as well able to resist the toxins being continually added to the blood in his body.

When called to treat a case of pneumonia, it is well to clean out the alimentary canal with a gentle laxative, as sodium phosphate, a Seidlitz powder, magnesium sulphate or a dose of calomel. A gentle laxative may be and should be used at any stage of the disease if indicated; however, the patient should not be purged to such an extent that weakness results. His strength should be guarded in every possible way. After the initial purge, it is better to avoid purgation, but simply keep the bowels soluble.

The usual expectorant mixtures are practically useless, apt to disturb the digestion, and should be avoided.

In many instances postassium citrate, sweet spirits of niter, or the two combined, being mildly sedative, expectorant, diuretic and diaphoretic, answer every indication in the first stage of the disease.

To patients who have recently had malaria and also to those who have recently been exposed to it, the sovereign remedy, quinine, should be administered during the first few days of the attack.

During the first few days of the disease, the pleuritic pains and the short dry cough may be relieved by sinapisms applied to the chest, or by morphine as indicated. In moderate doses morphine is safe at this stage of the disease, and it is very often of great value. It not only relieves the cough and the pain, but it permits the patient to sleep, and thus saves his strength. For the cough alone, codeine may be used instead of morphine, but generally it is less efficient than small doses of morphine.

In the later stages of the disease, morphine and other opiates are contra-indicated, and should not be used. The

respiration is embarrassed and more or less cyanosis is present —opiates make the condition worse. Should a sedative now be required, one of the bromides may be selected.

Meteorism, tronblesome in same cases, is well controlled by liberal doses of sodium phenolsulphonate. If this drug is administered from the beginning of the disease, meteorism, severe enough to be injurions or uncomfortable to the patient, is very rare.

A very, very important condition to be met is the progressive weakening of the heart. This condition varies very much in different cases. If the patient has been as nearly as possible at absolute rest, mentally and physically, has not suffered much pain, and had sleep in the early stages of the disease, he may not need any stimulants. Unsually, however, stimulants must be nsed. In this case, strychnine, or strychnine and digitalin, are probably the best drugs. Generally alcohol had better not be used. Its routine use should be condemned. Its use may be necessary in some alcoholic patients. A dose or two of some alcoholic preparation may be used to advantage at the crisis, in some cases; but even here other remedies are probably better. Hypodermics of camphorated oil may be used to advantage in some cases, especially when collapse threatens. Camphorated oil is also a good mild counter-irritant, and it is very much to be preferred to the old cotton jacket and to poultices of various kinds.

Pulmonary edema, a very serious condition, should be met by bold stimulation with strychnine and atropine, especially atropine. Counter irritation is recommended and should be used, but atropine is very much more important. In this condition morphine is recommended, but its nse shonld be avoided and condemned. It lets the patient die easy.

Last but not least, keep the patient quiet in bed for at least a week or ten days after crisis.

*THE PAST AND PRESENT.

H. C. BUCK M.D.,
FRIARS POINT.

The medical journals of to-day are so full of ultra-scientific papers that only confuse, and do not help those of us who are of the rank and file of the profession, that we are prone to ask: "What shall we write that will be of interest to others,

*Read before the Clarksdale and Six Counties Medical Society.

or that will, in any way, help them in their efforts to relieve the sick and suffering?" In the Bible we can read that, on one occasion, the Angel of the Lord appeared to St. John in a vision or dream, and said unto him: "Write the things thou hast seen, the things which are." While I do not feel that it will be of benefit, it may be of interest to some were I to follow the instructions given St. John, and write of some of the things I have seen during the forty years I have been engaged in the practice of medicine; "things which are" in this day and time, but were unknown when I began the practice of medicine.

It is interesting to one who has spent half a lifetime in harness, to look back through the vista of years, and recall the wonderful discoveries and inventions that have been made, and to note the wonderful forward strides made in our profession. During the years that are gone I have seen the advent of the hypodermic syringe and fever thermometer. In my early professional career both were comparatively unknown, the hypodermic syringe, for many years, being used only as a last resort, and only one or two remedies being so use. *Now* both are indispensible to the physician, and, judging from advances being continually made, the day is rapidly approaching when very many diseases will be treated by hypodermic methods exclusively.

Abdominal surgery, which was in its infancy at that time, has almost reached a state of perfection: very many operations, that are now considered simple, would not have been undertaken at that time. In my young days in the profession, if a person was shot through the intestines, wounded or cut, we let him die; we knew of nothing we could do for him. Now a very large per cent. of such cases are cured by the surgeon.

Blood transfusion, the X-ray and microscopy were not known at that time, or as regards the microscope, were not known as diagnostic aids. To-day the miscroscope is our most certain mode of diagnosis, or, at least, our greatest aid.

The telephone and automobile were unknown; to-day both are almost a necessity to the up-to-date physician.

I have lived through one or more epidemics of yellow fever when, by the "Shotgun Quarantine," "man's inhumanity to man" caused untold numbers to sniffer and die. I have seen the theory regarding the role played by the mosquito, in spreading this dreadful malady, demonstrated and proven, until now the disease is treated scientifically and humanely, and is practically driven from our fair Southland.

I have seen many "certain cures" for tuberculosis and syphilis put forth. They rise and like a star, sail through the medical firmament for a brief period of time, then, like a star, "Shoot from their bright spheres, and pass away to darkle in the trackless void."

If one will take the time to read some old work on Practice, and compare it with a late work, it is plainly to be seen that there has been quite a revolution in the general mode of practice, and in the treatment of very many diseases. I feel sure that, if one were to go before the examining board of any state, and answer the questions as they would have been answered forty years ago, he would be told to "go way back and sit down." This is an age of progress, and we must "hustle" to keep even in sight of the procession in its rapid advance. There is no place to-day in the profession of medicine, for the laggard or the idler; every member must be "up and doing" or very soon he will be left far behind.

Nearly every day I see something that I have not seen before; many are pleasant and instructive, while some are neither the one nor the other. Among the useless and unpleasant things that come under my observation, is the fight being made on the dispensing physician. This fight is, of course, made by, and in the interest of the retail druggist, and some of those making the fight go as far as to assert that the physician does not know how to dispense. I claim, if he does not know how to dispense he does not know how to prescribe, and should not be allowed to practice.

In the medical journals we frequently see articles, some of which condemn the specialist, while others defend him. I fail to see any good reason for any such articles. It seems to me the specialist is as much of a necessity as is the general practitioner; both are necessary and indispensible in their respective spheres; there is no mind that can master all the branches of medicine, while the general practitioner should have a general knowledge of all, the specialist is forced to keep up with his special branch. In a recent medical journal I find this thought: "One after another, the maladies formerly considered incurable, give way to the attacks of science; modern methods of investigation, modern means of meeting conditions, modern knowledge, and the constant lifting of the clouds of superstitions cowardice that enveloped our forefathers, have wiped many of the diseases from the list of the hopeless and incurable. Nobody can doubt that other, as yet unsolved,

problems will, in time, cease to be such." While I cordially indorse much that is contained in the above quotation, I wish to enter a vigorous protest against the word, "cowardice," as applied to our forefathers; the writer should have said "superstitious caution," not "cowardice," for no braver, nor more self-sacrificing men ever lived in any calling or profession than were our forefathers in medicine; and the same may be said of the majority of the members of the profession of the present day. I know of one town in Kentucky—my childhood home—when the yellow fever appeared in this town in 1878, there were twelve physicians there; some were young, some were old in years and medical experience. Not one of these men deserted his post, and only one lived through the epidemic; eleven, like brave soldiers, as they were, died at their post. Does this indicate cowardice? This was not an exceptional case by any means; in what other profession or calling in life will you find men more ready to sacrifice their lives for the good of the human race than in the medical profession.

Many years ago I read a poem, written in the early part of last century, or probably before that time, entitled, "Mother Shipton's Prophesy," in which the writer said: "Carriages without horses shall go, and men, like birds, will fly;" the old mother did not speak of "wireless telegraphy," nor "submarine navigation," but these are some of the things "which are" to-day. In "looking backard" I find memory fails to grasp all the things which I have seen in our profession, and the human mind cannot foretell the many wonderful things the future may reveal, for we live an age of progress: "Onward and upward" is the slogan of the present era.

But what is progress? Life is made of comparisons and hence, who can tell whether we advance or recede? According to the laws of nature, we must grow or decay. Unless we occasionally stop in our mad career, and note what others have done in the past, in other words, compare the past with the present. In a medical journal I find this thought: "To-day is practical, it busies itself with the myriad problems pressing for immediate solution, and has no time and energy to consider what other men thought, believed, or did at other many with the youth who, when reproached that he did not even know who the Romans were, indignantly responded that he had read his Bible as much as anybody in the house, only that to-day doesn't read its Bible. The dailies are all the reading to-day finds time do, and it takes a stretch to include the

Sunday edition, even though no individual peruses more than a selection from it. "Why this great haste? Would it not be better for all of us to adopt the motto of the old mountaineer, who was never in a hurry, and consoled himself by saying: "There is a whole day to-morrow, that haint been touched yet." Is it not possible that we of to-day can learn many valuable lessons from the history of those who have gone before? Will not such lessons give us renewed energy, and inspire us to more earnest efforts and determination to do our best? "No man is respectable who is not doing his best."

"Don't worry, but work;
Don't fear, but follow;
Don't pine, but pray;
Don't trouble, but trust."

Do not let failures nor difficulties discourage us, but let us remember the motto of the old man of the mountains, and strive to do our duty, and do our best.

*A CASE OF HAEMOGLOBINURIA OF UNUSUAL TYPE.

T. G. HUGHES M.D.,
CLARKSDALE.

I have, during my limited experience in the practice of medicine, seen quite a number of cases of malarial hæmoglobinuria, but the one I shall report was altogether so different—so lacking in many of predominant symptoms of usual cases of this kind—that I made a record of it and shall present the case to you as I saw it.

The patient, J. H., was a very small and frail-looking child, white, female, and aged about five years.

Family history was negative.

Past history was that she had the usual run of diseases of childhood. At the age of six months she had a severe case of la grippe, lasting something like three weeks. When she first began to walk, a perceptible limp was noticed in the left leg. This limp, so a physician told the mother, was the result of the la grippe having affected the spinal column. However, upon a later and more careful examination, it proved to be due to a congenital dislocation of hip, which is now being corrected by a specialist.

She had malaria in August 1912, some six or seven paroxysms on alternate days.

*Read before the Clarksdale and Six Counties Medical Society.

Present illness began with chill at 8 a. m., morning of March 14th. 1913. Mother gave purgative—calomel—but did not follow it by quinine. About 9 a. m. on March 16th. she had another chill and passed the first bloody urine—something like six ounces—two hours later.

I first saw patient about noon on March 16th., an hour after passage of first bloody urine. Had her pass urine at 12:30 and found that it was not nearly so thick and bloody-colored as first passage. The amount was about three ounces.

Subjective symptoms were extremely mild and were as follows: slight nausea and vomiting (these are usually extremely severe and troublesome in these cases); bowels were constipated; kidneys acting freely—iij$\bar{3}$ in 1½ hours; neither headache nor nervousness present; very little shock; thirst was rather extreme.

The physical examination revealed the following symptoms: general appearance was that of an anemic and rather delicate child; mucous membranes pale with exception of ocular conjunctiva which was slightly icteric; skin was rather thick, dry and slightly icteric (and this cleared up at once—usually increases); temperature, per rectum, was 103⅖° F.; pulse, 120, regular, and of medium tension; abdomen was distended and tender on pressure; liver was large—about two fingers breadth below costal cartilage—and extremely tender on pressure and especially so in region of gall bladder; spleen enlarged, easily palpable, and tender on pressure; urine was typical of the disease; blood was extremely laky—30% perhaps hæmaglobin—and upon microscopical examination showed malarial parasites of æstivo-autumnal variety.

Gave one-half (½) grain doses of calomel every thirty minutes until ten doses were given—5 grains in all. Instructed mother to give water ad libitum as there was extreme thirst, no nausea or vomiting to speak of, and then I desired the diuretic affect of the liquid.

Patient passed clear urine about six that afternoon and temperature had fallen until it was normal.

On morning of March 17th. found patient looking bright and cheerful, hungry and feeling as well as she usually did. Wanted to get out of bed to play with other children. Temperature normal and pulse 80. Purgative of evening before had acted freely—five or six times. The blood examination having shown the presence of malarial parasites and the urine being entirely clear or normal, I decided to begin the use of

quinine at noon—1½ grains every three hours—cautioning the mother to discontinue the use of same should there be a reappearance of hæmoglobinuria. I was sure such would be the case. Correct was my surmise, for it did return at six that afternoon. When informed over the phone by the mother that such was the case, I instructed her to give grain doses of calomel every hour until four (4) doses were given. Heat was applied to extremities as rigor had ushered in the trouble. The temperature rose to 101⅗° F. There was only one passage of the bloody urine, the next passage being entirely clear.

On March 18th, I found temperature and pulse normal, bowels acting freely, skin and conjunctivæ clear, urine clear and increased in quantity. Put patient on tonic and instructed mother to keep bowels well open by use of laxative.

Patient still doing nicely on March 19th, and 20th. Urine clear, no fever, appetite good, and patient progressing rapidly. Found patient out of bed, but ordered her back as wanted to conserve all strength.

On March 21st, there was a slight return of hæmoglobinuria about 5 p. m. Liver wa sevidently either inactive or was unable to take care of excessive amount of waste material that was being sent to it, so I ordered a mercurial purge to help it out. It served the purpose intended. On morning of 22nd, bowels were acting freely and urine was clear until 10 a. m. when there was a passage of brownish-colored urine. There was no fever and patient was feeling fine and looking very much better than she ever had since illness began. This passage of brownish-colored urine at 10 a. m. was the last she had and her recovery from this time on was uneventful.

*THE MEDICAL TREATMENT OF EXOPHTHALMIC GOITRE.

BRYCE W. FONTAINE M.D.,
MEMPHIS, TENN.

It has been my privilege within the last few years to observe about thirty cases of exophthalmic goitre, in my private practice, in consultations, and in the hospitals.

The conclusions I will draw will be from this series of cases, and from an extensive study of the literature. I am convinced that in my section of the country, the disease is on the increase; this is especially true in the great frequency of the incompletely developed cases, without the triad of cardinal

*Read before the East Mississippi Four County Medical Society.

symptoms—the exophthalmos, the goitre, and the tachycardia.

I think if our cases are studied carefully, incomplete or latent hyperthyroidism will frequently be found as the cause of many cases of unusual nervousness, cardiac neuroses, tachycardia, unexplainable temperature, and some of the neurasthenias, all occurring in our female patients.

In these cases, there is very little upon which to base a diagnosis, and consequently the disease is frequently overlooked, unless it is kept in mind. In doubtful cases some reliance can be placed upon the blood examination. In my experience, and from the reports of Kocker, the subject's greatest living student, the lymphocytes are nearly always relative ly increased. In those cases still doubtful after the blood examination, it is justifiable to give small doses of thyroid extract, when the nervous symptoms and pulse rate will invariably be exaggerated, if the condition in question is due to a disturbance of the thyroid gland.

The diagnosis of the well developed cases, I need not dwell upon, as everyone is familiar with the characteristic or cardinal symptoms. This symptom group is distressing to the average patient, and sufferers from the disease are most pathetic and woeful to look upon, and are in dire need of measures for relief.

In the wave of surgical enthusiam there is an attempt upon the part of surgeons to regard the disease as one purely surgical, and in their articles there is often seen the dogmatic statement that every case should be operated upon.

Conservatism is each year becoming more noticeable in the writings of those surgeons who have had the most operative experience, and I need only mention the last articles of C. H. Mayo in the Journal of the A. M. A. This conservative attitude that these surgeons are assuming, is especially to be noted against the sweping statements of others with less experience, that all should be operated upon. Do not mistake me to infer that I would altogether condemn surgical procedure, for I am ready to admit that brilliant results have been achieved at the hands of the best operators, but at the same time, I have seen, in many cases, successful results follow careful, persistent medical treatment.

The operative removal of the gland is fraught with considerable danger. Twice within the past year, two cases in our hospitals have died on the operating table, from hemorrhage, though in the hands of two of our best surgeons. As closely

related as the gland is to the parathyroic gland and the recurrent laryngeal nerves it is an easy matter for these most vital structures to be damaged. Worse still, complete extirpation of the gland, in severe cases, frequently results in signal failure to relieve, just as surely as does the medical treatment.

I might quote statistics for the next half hour, and then not make the matter any clearer. I want to emphasize the fact that there are a great many medical men, among them Hale White, Murray, MacKenzie, Musser, Cohen, Preble and others, who still believe that medical treatment has a prominent place in the treatment of the disease, and their opportunities and experience have been as large as the more prominent surgeons who are so zealously advocating radical treatment. I do not believe that the surgical treatment of the disease should be attempted in any case until proper medical measures have been carried on for at least four weeks. In those severe toxic cases with restlessness, delirium, and dilatation of the heart, medical treatment with ligation of the thyroid arteries under local anæsthesia, is absolutely indicated.

In cases of exophthalmic goitre with a large gland, surgical treatment may be indicated for cosmetic reasons, or to relieve pressure upon the neighboring structures. In all other cases, surgical measures should be resorted to only after the failure of medical treatment.

Of course, I realize that there is a limit to the persistence of medical treatment, and I am prepared to accept as true the statement, which is often made by surgeons, that the heart may become so dilated as to hazard the operation very materially if the condition is temporized with too long. Four weeks is a fair test, and if in that time no material benefit in the reduction of the pulse rate, lessening of the nervousness, gastric or intestinal symptoms, can be observed, surgical treatment should be resorted to without delay.

The medical treatment which has been given a trial, even though it does not afford relief, prepares the patient, and unquestionably limits the risk of operation.

The most important criterion in judging the results of the treatment, is the rate of the pulse. It is not always possible to cure the exophthalmos in severe cases, but any improvement at all will certainly manifest itself in the circulation, and in the nervous system. We should not consider any case as having recovered until the pulse has assumed its normal rate.

What constitutes medical treatment? The most important and essential element is rest, and this includes absolute rest, physical and mental. The best results are always obtained with the patient away from home, in an institution. It is surprising how easily the victims of this disease are affected by psychic influences.

The patient shou'd be in charge of a congenial nurse, and strict isolation from everyone but the members of the immediate family enforced. The length of time for the enforcement of this rest and isolation varies from a few weeks to several months. Our most important guide is the rate of the pulse, and not until it is normal should we permit the patient to get out of bed.

In conjuntcion with rest and isolation, massage and hydrotherapy should be practiced. In the beginning, a light alcohol rub, morning and night, with passive movements of the joints and, later, more vigorous massage of the extremities and abdomen will be of benefit.

In cases with nausea and vomiting, or tachycardia, proper application of ice-bags will frequently afford relief. The employment of hot packs or hot fomentations is sometimes necessary for the relief of the intense nervous symptoms.

The diet should consist of an abundance of easily digested food, avoiding the stimulating articles of diet, such as salt, pepper, pickles, condiments, coffee and alcoholics. On account of the usual loss of weight, it may be necessary to supplement the regular meals with feedings between, consisting of eggs and milk. In those cases with extreme nausea or vomiting, it is best to feed the patient only albumin-water, and as these symptoms subside, peptonized milk may be given, and gradually the full diet may be resumed. I would rather starve the patient than resort to the ridiculous rectal feeding.

Specific Therapy: there is none. The nearest approach is the use of Beebe's serum. My experience has been limited to its use in five cases, in all of which improvement occurred, but I am unable to determine whether the improvement was due to the serum, or to the rest and other measures which were a part of the treatment. The majority of the observers who have given the serum an extended trial, question its value; however, Beebe and Rogers are still very enthusiastic in its use.

The use of the X-rays in the treatment of the disease is of benefit. There is some danger in the use of this agent, because we are unable to tell just where to drop its use, and cease

its inhibitory action short of developing a myxedema. The reports in the literature are from radiologists, and I fear that their enthusiasm has biased them in their estimate of its value.

Drug Treatment: in conducting the treatment of any case, there will frequently be need for the use of the bromides for restlessness, for trional or veronal for sleeplessness, iron and arsenic for anemia, and phosphate of soda or salines for constipation. However, by far the most important drug is hydrobromate of quinine. This drug should be given in capsules, five grains three times a day, and continued indefinitely. It is advised that the drug should be chemically pure and neutral in reaction.

Biological Treatment: the close relation of the ductless glands and the apparent antagonistic action of several with the thyroid gland suggested the use of various extracts of the thymus, suprarenal and pituitary glands, in the treatment of the affection. The best results have been obtained from the use of suprarenal extract, and I need only call your attention to the enthusiastic report of the late G. A. Gibson in the use of this treatment, and my colleague, Dr. McCown.

Gibson used the suprarenal extract subcutaneously, in gradually increasing doses, at intervals of two or three days. Dr. McCown has obtained the best results by boldly injecting small doses into the gland. Our most prominent advocate of the pituitary extract is Solis Cohen, and it is his belief that many of his cases were benefited by its use.

Local treatment is limited to the injection of boiling water into the gland. In the hands of Dr. Porter, good results in some cases have been obtained, but the idea is too new to warrant endorsement.

In conclusion, let us remember that there is a very important place for the medical treatment of exophthalmic goitre, that all cases should be operated upon when medical treatment has been persistently tried and proven unsuccessful, and lastly that there are a few cases which demand immediate ligation of the thyroid arteries, under local anæsthesia in conjunction with medical treatment.

Small-Pox—Eleven of the thirteen patiens now in the small-pox hospital of Chicago, qualifying for waffle-iron faces, came from a "health institute" which denounces vaccination as wicked, superstitions, useless, nasty, impertinent and an "invasion of personal rights." This condition is typical. Small-pox has been well named the "poisoned arrow of the fool-killer." Those who want to escape these arrows had better provide themselves with the only shield that experience has proved effective—vaccination.—Chicago Journal.

MISSISSIPPI MEDICAL MONTHLY.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

THE LEGISLATURE, NOW IN SESSION, IS CONSIDERING A BILL PERMITTING THE ESTABLISHMENT OF COUNTY SANATORIA FOR THE CARE OF TUBERCULOSIS AND ONE PROVIDING SANITARY TOILETS IN RURAL SCHOOLS. THE IMPORTANCE OF THESE MEASURES NEEDS NO ARGUMENT. YOU CAN HELP BY SENDING YOUR SENATORS AND REPRESENTATIVES A NOTE ASKING THEM TO PUSH IT ALONG. THE USE OF THE MAILS FOR SUCH A NOTE IS OPEN TO EVERYONE AND TWO CENTS WILL TURN THE TRICK. DO IT NOW!

"Would it not be a good and practical step for the County Medical Societies to prepare a pledge and obtain the signature of every physician in the county in which it would be agreed by each physician to adopt some approved method of prophylaxis in his obstetric practice and to use his influence to secure the co-operation of his associates to the same end? In the event this were done by the medical profession throughout the state it would be a decided step in preventing blindness due to infection of the eye at birth—*Health Bulletin.*

It certainly would. Where the prophylaxis of gonorrhœal ophthalmia is so simple, effective and *cheap*, it is nothing short of criminal carelessness that permits a case to occur. It is simple—any fool can put a drop of a ready-made solution into a baby's eye. It is effective—this has been amply demonstrated. It is cheap—a one ounce bottle of two per cent. silver nitrate solution, corked and labeled, costs the druggist about a dime. he will probably not charge the doctor for it at all, and a good medicine dropper will be thrown in for good measure—if you want to be liberal pay the druggist fifteen cents for your outfit. This will treat two hundred and forty babies, but you will

waste probably half your medicine so put the limit at a hundred to be on the safe side. Fifteen cents a hundred pair to save eyes! That's only for the medicine though, how about the time? Very well, what's your time worth? Let's be liberal. Say you are earning a thousand dollars a month and that's certainly a liberal average in Mississippi, your time is worth about two and three-tenths cents a minute and it only takes—again we are liberal—about a minute to put the drops into the baby's eyes. On the above estimate, which is extremely liberal, you can treat one baby's eyes for less than two and a half cents. Isn't that worth while when Dr. Curry tells us that one-third of the inmates of the Blind Institute in Jackson are there on account of gonorrhœa? There were 25,641 births recorded in Mississippi for the first nine months of 1913, an average of 2,737 a month. These could have been prophylactically treated, if the cost of the drug alone is considered, *for four dollars a month.* For *four dollars a month* the State of Mississippi can cut off one-third of the blindness in its future population. For *four dollars a month* its legislature or its State Board can save the state, not one-third of the cost of the care of its blind children, for the proportion would not be exact, but a material sum. And if it be true of us, as estimated in New York, that it costs ten thousand dollars to properly rear and educate one blind child as against six thousand for a normal child, the *four dollars a month* would make a cash return on the investment that would stagger a Wall Street magnate.

Physicians are all fully cognizant of the prevalence of gonorrhœa and as they all mean well and play fair in their practice, their failure, and some of them fail, to use silver nitrate solution in the eyes of the newborn can only be attributed to carelessness. The writer has heard one or two excuse this carelessness by saying that they "always use it in suspected cases." From an experience of nineteen years in hospitals and general practice, the writer is prepared to say that every male organ of generation is now, with him, a suspected case. He finds it easier, that is to say it excites less comment, when he can tell any inquiring grandmother that he uses ophthalmia prophylaxis in every case. He would use it in a parsonage as quickly as in the red light district, because he makes it a routine procedure. He knows he has put a quietus on any gonococci, should they happen to be present, and for the rest of it, to quote Red Saunders, he doesn't "give a frolicsome cuss." "*Honi soit qui mal y pense.*"

Letter to The Editor.

Dr. W. K. Deaderick, of Hot Springs, is sending out the following letter and asks us to print it:

DEAR SIR:

I desire to call your attention to the Malaria Section of the National Drainage Congress.

This section was organized during the Third National Drainage Congress held at St. Louis, April 10-12th, 1913.

Our object shall be to stimulate the study of the distribution, prevalence and economic importance of malaria, to conduct a campaign of publicity as far as our means will permit, and to devise ways and means to effect a permanent and efficient campaign against this grave disease.

The next meeting of the Congress will be held in Savannah, Ga., in 1914, the exact date to be announced later. At this meeting an extensive malaria program is contemplated.

Your membership and co-operation are earnestly desired. We want you to attend the next meeting and to contribute to the program or take part in the discussions. The membership fee in the section is two dollars. Please have this letter read before your medical society.

Cordially,

WM. H. DEADERICK,
Secretary.

Society Proceedings.

LAUDERDALE COUNTY MEDICAL SOCIETY has elected the following officers for 1914: T. D. Bourdeaux, president; K. T. Klein, vice-president; G. F. Douglas, secretary-treasurer, re-elected; N. L. Carke, censor, re-elected; Jas. Bennett, delegate; all of Meridian. The society, having more than fifty members, is now entitled to two seats in the House of Delegates of the State Association, and is the first of the component societies to attain this standing.

G. F. DOUGLAS.

TRI-COUNTY (C. P. L.) held its regular bi-monthly meeting in the parlor of the Inez Hotel, on December 2nd., W. B. Beasham presiding, D. W. Jones, secretary, with the following additional members present: Drs. Arrington, Butler, Brumfield, Beavers, Boyd, Collins, Catchings, Dickerson, Frizell, Gordon, Gerald, Higdon, Johnson, Little, D. W. Magee, McRee, Purser, Ramsey, Robertson, Silverstein, Thompson.

The secretary read his annual report, showing that the

Society had not missed a meeting nor failed to carry out the scientific program as scheduled during the year passed, that a good attendance had prevailed, and that a healthy balance was in the treasury. President Beacham read his annual address ,replete with wisdom and sound advice. This was referred to the publication committee with request for publication in the *Mississippi Medical Monthly*.

Under the head of routine business, the secretary read a communication from Dr. A. P. Cobb, a member of the State Association, now in distress at Asheville, N. C., asking for assistance. A letter from Secretary Howard, vouching for the genuineness of the condition depicted, and certifying that Dr. Cobb is a member of State Association, was also read. The secretary was instructed to pass that hat, and eighteen dollars and fifty cents were collected and forwarded to Dr. Cobb.

Following officers were elected: President, W. L. Little; vice-president, J. M. Catching, W. H. Frizell, E. R. Gordon; secretary-treasurer, D. W. Jones.

After the election of officers, the Association repaired to the dining-room of the Inez, where the annual banquet was served.

D. W. Jones.

Book Reviews.

PRINCIPLES OF SURGERY. By W. A. Bryan A.M., M.D., Professor of Surgery and Clinical Surgery at Vanderbilt University, Nashville, Tennessee. Octavo of 677 pages with 224 original illustrations. Philadelphia and London: W. B. Saunders Company, 1913. Cloth, $4.00 net.

It is certainly gratifying to note a work on surgery by one of our southern men. It has seemed that all our works on surgery must come from northern teachers and students. Professor Bryan in his work shows clearly that a man in a southern University can write equally as well as any and vastly better than many who have preceded him.

The book is well edited and the illustrations clear and distinct. The avoidance of superfluous words and sentences and his ability to get right down to the subject matter with no preliminary verbiage make the book an exceptionally valuable one to those who cannot devote an entire evening to the looking up of any given matter.

The entire subject of burns is covered in six pages, with two large illustrations, and you will kindly not the word covered. All the other chapters are short and to the point. Being the first edition everything is absolutely new and there are no re-written chapters nor chapters inserted that were written years ago.

An excellent book.

S. W. JOHNSTON.

A TEXT-BOOK OF THE PRACTICE OF MEDICINE. By James W. Anders M.D., Ph.D., LL.D., Professor of Medicine and Clinical Medicine, Medico-Chirurgical College, Philadelphia. Eleventh Edition Thoroughly Revised. Octavo of 1335 pages, fully illustrated. Philadelphia and London: W. B. Saunders Company, 1913. Cloth $5.50 net; half Morocco, $7.00 net.

It is a pleasure to meet an old friend like Dr. Anders' book, in its present up-to-date revision. In fact, all practitioners, at whose right hand it always is, will be glad to know that a new edition has appeared. Even the mention of all the new matter added would take an entire page.

The mere fact that it has run eleven editions in nearly as many years, speaks itself for the favor that this valuable text-book enjoys among the profession, and it may be said, deservedly enjoys.

As a reference book, it is exceedingly useful, giving the information required in simple terse language without any circumlocution. All in all, it is easily first amongst the text-books on practice in the English language.

S. MYERS.

ESSENTIALS OF NERVOUS DISEASES AND INSANITY. By John C. Shaw M.D., Late Clinical Professor of Diseases of the Mind and Nervous System, Long Island College Hospital. Fifth edition, thoroughly revised, by Louis Casamajor M.D., Chief of Clinic, New York Neurological Institute. 12mo. of 187 pages, illustrated. Philadelphia and London: W. B. Saunders Company, 1913. Cloth, $1.00 net.

It may be truthfully aid that neurology and psychiatry undoubtedly lead to-day all other branches of medicine in the rapidity of their progress and the present revision of this little volume was undertaken with the idea of placing this new matter before the student. Particularly, the cerebro-spinal fluid findings have been carefully described, and a short description of cerebro-spinal syphilis included.

It is a very good epitome of the whole subject.

S. MYERS.

ESSENTIALS OF BACTERIOLOGY. By M. V. Ball M.D., formerly Instructor in Bacteriology at the Philaphelphia Polyclinic. Seventh Edition, revised. Assisted by Paul G. Weston M.D., Pathologist State Hospital for Insane at Warren, Pa. 12mo. of 321 pages, with 118 illustrations, some in colors. Philadelphia an dLondon: W. B. Saunders Company, 1913. Cloth, $1.00 net.

This compend which is in its 7th edition, has undergone a complete revision and brought up to the last minute. It is not intended to be a complete text-book upon the subject, but a work which will assist in rapid review, or just obtain an outline view of the subject. As such it is admirably adapted to its purpose.

S. MYERS.

THE TREATMENT OF RHEUMATIC INFECTIONS. Press of Parke, Davis & Co., 1913.

This little brochure, devoted to a description of the phylacogens, principally of rheumatism, is well worthy of perusal. It gives the history of the phylacogens, the methods of preparation, the contra-

indications, and finally devotes the major portion of the book to rheumatism phylacogens, and then takes up the various forms of rheumatism and the application of phylacogens to them.

S. MYERS.

MATERIA MEDICA, PHARMACOLOGY, THERAPEUTICS AND PRESCRIPTION WRITING. For Student and Practitioners. By Walter A. Bastedo Ph.G., M.D., Associate in Pharmacology and Therapeutics at Columbia University. Octavo of 602 pages, illustrated. Philadelphia and London: W. B. Saunders Company, 1913. Cloth, $3.50 net.

This very valuable contribution to this subject is the outgrowth as so many other good books are of lectures delivered to students in Columbia University. The author's endeavor has been to make his lectures practical, that is, so as to be of use to his students when freed from technical studies, they go forth to heal maybe, and maybe not. He has, therefore, omitted some purely pharmalogical discussions, which, while of great interest to teachers, bore the student who wants facts and cares not how they become facts.

Particularly to be commended in the chapter on Prescription Writing is the fact that the author has recommended but one method, and omitted mention of other methods. Frequently in the lecture room and in text-books, valuable time and space is taken up in the discussion of methods the reader to be informed at the end of the chapter that the before-discussed theories and methods are obsolete.

The tracings in this work are exceptionally beautiful and it is up to Saunders' usual standard of book-making. We believe, however, that on the title page, the author should say he is an associate in Columbia, not at Columbia. That is a matter of taste.

S. MYERS.

ESSENTIALS OF GYNECOLOGY. By Edwin B. Cragin M.D., Professor of Obstetrics and Gynecology, College of Physicians and Surgeons, New York. Revised by Frank S. Mathews M.D., Assistant Professor of Clinical Surgery, College of Physicians and Surgeons, New York. Eighth Edition Thoroughly Revised. 12mo. of 240 pages, illustrated. Philadelphia and London: W. B. Saunders Company, 1913. Cloth, $1.00 net.

A capital little compend that well fills the requirements of its class.

E. F. HOWARD.

A woman who always imagined she was ill called in two eminent physicians to have a consultation. After they had seen and questioned her about her symptoms, etc., they retired to the library to talk the case over.

The woman called her sister and told her to go and listen at the door to hear what they said, and this is what was heard:

The first doctor said: "Well what do you think of her?"

"I think she's the ugliest woman I've ever seen."

"Oh," said the other doctor, "wait till you see her sister."—Tit-Bits.

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*SERUM THERAPY.

E. W. HUNTER M. D.,
GREENWOOD.

By way of review a word may be said as to how bacteria cause disease. Their action may be mechanical, parasitic or toxic. The last is the most important and with it we are chiefly concerned. Bacterial poisons are toxins, a term used to denote the toxic secretions of bacteria, and endotoxins, a toxic content which is liberated only by the dissolution of the bacteria. The effects of these poisons constitute disease.

I have just read an article by Vaughn of Ann Arbor on the subject of protein poison and its relation to disease in which he makes reference to the newer theory of how bacteria cause disease. He says that the cell is the morphologic unit of life. Every living cell must form ferments by which it splits up the pabulum on which it feeds. Whether a bacterium is pathogenic to a given animal or not depends upon two things. First, in order to be pathogenic it must be able to split up and feed upon the proteins of the animal's body; otherwise it cannot grow and mutiply in that animal's body and, consequently, harm it. Secondly, the ferments of the cells of the animal's body must not be immediately destructive to the invading bacterium. When the ferments of the body cells have this destructive action on the bacterium, the latter cannot be harmful to the former. These two things determine the pathogenicity or non-pathogenicity.

Bacteria consists largely of proteins and all proteins at some stage of digestion are poisonous. When digestion takes place in the alimentary canal the proteids are not absorbed during the poisonous stage. When they are, however, introduced into the body other than through the alimentary canal, they must be digested by the blood and tissues, and in this process the poisonous stage is reached and the body cells are

*Read before the Leflore County Medical Society.

poisoned. This is what happens in the digesting of bacteria by the body cells.

This poisonous protein that Vaughn speaks of seems to be very similar to the endotoxins.

The treatment of disease with serums has for its object the production of immunity. Hence it will not be out of place here to say a few words on the subject of immunity in order to freshen our minds on that subject. By immunity we are to understand that power of the body, successfully to resist infection. It may be natural or acquired. Our concern is with the acquired form. Acquired immunity may be active or passive. Acquired active immunity is that condition of the body in which the body cells have been so acted upon or trained that they have the power of producing antibodies which ward off infection. In acquired passive immunity, certain antibodies have been introduced artificially which have the power of protecting the body from infection. Immunity may also be antibacterial, that is destructive to bacteria; and it may be antitoxic, destructive to toxins.

Active immunity is produced by actual disease or by vaccination. Various methods are used in vaccination. In animal experimentation, virulent organisms are used, but this is by the use of attenuated virus or toxin as in small-pox. A third method is by the use of killed organisms as in typhoid. Still another procedure is by the injection of bacterial constituents as in Koch's tuberculin. The underlying principle in vaccination is that there can be "No protection without infection," using the term infection broadly to include not simply inoculation with bacteria, but with bacterial toxins also.

Passive acquired immunity is produced by the injection of antibacterial serums or of antitoxins.

The principles involved in immunity may be best considered under three heads: vaccination, antibacterial serums and antitoxins.

The value of vaccination lies in the fact that the body cells are stimulated and trained to the production of substances, receptors and amboceptors of Ehrich, fixators of Metchnikoff, ferments of Vaughn, or whatever other name may be applied to them, which have the power of overcoming infection. When an individual protected by vaccination is exposed to infection, the organism is destroyed before it has time to do any harm.

A certain incubation period is required in vaccination, and immediately following the injection of the vaccine there is said

to be a decrease in resistance to infection. This is called the "Negative phase" and is supposed to last from one to three days. Practically, however, not much attention is paid to this condition.

Vaccination is used for both prevention and cure. It has been found of greater value in prevention, as in small-pox, typhoid, plague, hydrophobia. This method of protection could be used in diphtheria and tetanus, but such use is not practicable in the face of better means. tI may be used with good results after infection has taken place if the incubation period is sufficiently long, as in small-pox and hydrophobia.

As a curative agent vaccination finds its greatest use in localized infections, both chronic and acute, but more especially in chronic diseases. As Wright says, it may be employed "to exploit in the interest of the infected tissues the unexercised immunizing capacities of the uninfected tissues" or as Vaughn puts it "they operate by stimulating a wide area of body cells to furnish a ferment which destroys the bacterium that is the cause of the local condition." Just as if a detachment of an army should be attacked by a larger force of the enemy; if the whole army should be rushed forward to the aid of the detachment, the enemy might be beaten off.

In general infections the value and mode of action of vaccines are not so apparent. It does not seem rational to add to an already over-intoxicated case an additional dose of toxin. The body cells are already stimulated to the utmost. If of value in such conditions its action is not yet understood.

Much experimental work has been done in the treatment of typhoid, pneumonia and other infectious diseases by means of vaccines with great claims of success, but so far the value of such treatment has not been sufficiently demonstrated to justify the general practitioner in using it in that class of cases.

The question arises in the treatment of suitable cases by means of vaccines whether to use autogenous or stock preparations. Generally speaking it is preferable to use the autogenous vaccine, but since it is seldom possible to do this, it is more frequently the case that we shall be compelled to rely upon stock material.

When it comes to bacterial serums, thoretically it would seem that they should be of value, but practically such has not been found to be the case. This is rather disappointing. It would be so easy to treat disease were it possible to inject a serum and at once to kill all the invading organisms. But

even if that were possible, in some diseases the result might be immediately disastrous to the patient. In such infections as typhoid and cholera in which the bacterial poison is an endotoxin the liberation of so great an amount of poison at one time might easily be sufficient to cause death. It would be better in such cases to proceed by easier stages in getting rid of the infection.

Another obstacle in the way of the successful use of a bactericidal serum lies in the inaccessibility of the organisms. In both typhoid and cholera, for instance, the intestine acts as a reservoir for the bacilli, from which a fresh supply is being constantly poured into the system.

Antibacterial serums have been found to be of greater value for prophylaxis than for cure. The immunity produced, however, is but temporary. Used in conjunction with vaccines, they are of greater value.

Antitoxin in its practical application affords an interesting study. The neutralization of toxin by antitoxin is believed to be a chemical union. In the test tube this is a simple matter. There is no other substance with which either may unite. But in the body conditions are more complex. Here the toxin may unite with the antitoxin or with the body cells according as it has a greater affinity for the one or the other. In some diseases, as tetanus, the affinity of the toxin for the body tissues is very great and the union is very rapid and firm. In other diseases, as diphtheria, the affinity is not so great nor does the union between the toxin and the cell take place so quickly or so strongly.

Antitoxin used as a curative agent acts in a twofold manner. It must neutralize the circulating toxin, that is the toxin still free and unbound in the circulation. Not only this but it must wrest or tear the bound toxin from the body tissues. For the neutralization of the circulating toxin, only an equivalent amount of toxin is required. But to tear away bound toxin is a much more difficult matter, especially when the union is strong as is the case in tetanus, and a great excess of antitoxin is required to do this.

It is well to state here that antitoxin has the power only to neutralize toxin and that it can in no way repair damaged tissue or kill bacteria.

In the curative use of antitoxin therefore there are two important relations to keep in mind: first that it should be used arly so as to neutralize the toxin before it becomes bound

with the tissues in such amount as to be fatal; and, second, to use it in sufficient amount to wrest the bound toxin from the body cells if that be possible. To do this a great excess of antitoxin over the toxin is required. Once the body tissues are fatally damaged antitoxin is then of no avail in whatsoever amount it may be used.

The comparative study of diphtheria and tetanus has served in great measure to make clear the principles of antitoxic therapy. In regard to tetanus, experiments have shown that the affinity between the toxin and the antitoxin is relatively weak, while the affinity between the toxin and the nervous tissue is strong. These two facts show why the curative value of tetanus antitoxin is low. Also the fact that the tetanus toxin attacks nerve tissue by preference renders the damage done far more serious than would be the case if low grade tissue were affected. On the other hand it has been found with respect to diphtheria that the affinity between the toxin and the antitoxin is relatively strong and that the affinity of the toxin for the tissue cells is less than that of tetanus antitoxin and also that it attacks a lower grade tissue. Hence diphtheria may be cured after the onset of the disease, whereas a cure in tetanus is rarely effected.

It is evident from the froegoing that the use of antitoxin for prophylaxis is a much more simple matter than it is for therapeusis; and also explains why tetanus antitoxin is of value for prophylaxis and of but little benefit in cure.

The immunity afforded by antitoxin is of short duration.

In the study of the serum therapy of particular diseases, they will be thrown into groups as far as is possible.

Under group one will be considered those diseases which are caused by soluble toxins of bacterial, animal, and plant toxins. In this class the serums of highly immunized animals are protective for the corresponding intoxications in man and other animals.

Of the bacterial diseases belonging to this group, diphtheria and tetanus are the most common and important. Concerning these two diseases sufficient has already been said with respect to their prevention and cure by means of antitoxins, bactericidal serums, and vaccines.

Of the soluble plant toxins, that causing hay fever is the most important. The toxin is contianed in the pollen. The antitoxin is obtained by immunizing horses with the toxin as is done in the case of diphtheria and tetanus. It is said to be

of value in some cases and without result in others. The failures may be due to not using the right antitoxin; for it is conceivable that plant toxins differ as much as bacterial toxins. And again it may be due to great affinity of the toxin for the tissues, as is the case in tetanus, and large quantities may be needed to wrest the toxin from the cells.

Of animal toxins, that of snakes is most common. The venoms of different snakes differ in their action. Some attack the nervous system; some the blood corpuscles, and others the blood vessels, causing hemorrhages. The antivenin or antitoxin is obtained by immunizing horses with the venom. Since there is no incubation period in snake bite, to be of service, the antitoxin must be used immediately.

The second group of infectious diseases is caused by bacteria which do not secrete a strong soluble toxin but which instead contain endotoxin. Infection or immunization causes immunity of prolonged duration. In active immunity the serum of the animal is protective for other animals, but has little curative power. Vaccination is of value in this group. The serum in acquired immunity is increased in bactericidal and opsonic rather than in antitoxic power.

The principal diseases belonging to this group are typhoid, cholera, plague. Prophylaxis by means of vaccination has proved to be of more value than cure by means of serums.

A third group of infectious diseases is that in which acquired immunity of prolonged duration is not established. In some instances soluble toxins are produced. In others the reason of heir infectiousness has not been determined. In some instances immunization causes increased resistance to infection, while this property is absent in others. The serums of animals may or may not be protective for other animals.

The principal diseases put in this group are: pneumonia, streptococcic and staphylococcic infections, gonnorrhœa, meningitis and influenza.

As to pneumonia, no one organism is the exclusive cause of the disease; the diplococcus pneumonia, however, is the most common organism involved. No characteristic soluble toxin is found, the poison being an endotoxin. Various serums have been prepared for the treatment of pneumonia, but none of them has proved satisfactory. This may be due to the fact that different organisms are concerned in the causation, or that it is not practicable to administer the serum in sufficient dose to be efficient. Rosenow has proposed a vaccine that promises

to be of value. He says that if virulent pneumococci be suspended in a physiological salt solution, the toxic element goes into solution. The soluble part of the virulen is very toxic and has but little immunizing power; while the insoluble remnant is not very toxic but has high immunizing power. During the pneumonia season in the past three years, two hundred and eighty-four cases of pneumonia were treated in the Cook County Hospital. Of these no selection of cases was made; every second case was treated with the vaccine. The percentage of death among the uninjected was thirty-seven and eight-tenths; the rate among the injected cases was twenty-three and three-tenths per cent. This is a favorable showing, and it is to be hoped that further trial will demonstrate beyond question the value of the treatment.

In streptococcic infections the toxic principle has not been satisfactorily demonstrated. The difference of opinion is probably due to the use of different strains for experimental work. This organism is the infecting agent in a number of conditional wound infections, cellulitis, endometritis, tonsillitis, erysipelas, impetigo contagiosa and other conditions.

Some claim that it is also responsible for scarlet and rheumatic fever. It is a disturbing factor in other infections as diphtheria, tuberculosis, enteritis and often leads to fatal complications.

The protective power of the serum depends upon its power to stimulate phagocytosis rather than upon antitoxins and bacteriolysins. This value, however, does not seem to be very great. The use of serums and vaccines together would probably give better results.

With respect to the staphylococcus, vaccines have been found to be of value in acne and furunculosis.

The toxic principle in the gonococcus seems to be an endotoxin. The antigonococcic serum has not proved to be of great value. The vaccine is not considered to be of much value in acute urethral infections. In acute epididymitis it is probably of value; also possibly in some chronic conditions in gonorrhœal infection. It finds its greatest value in gonorrhœal arthitis.

The serum for meningitis has proved to be of real value. This will be discussed in another paper.

In group four we place those infectious diseases which usually are more or less chronic, but which may run an acute course. Infection in these diseases produce but little if any

immunity. Serums are of but little value for either protection or cure.

In this class are tuberculosis, leprosy, glanders, actinomycosis, and some other diseases. In these we shall consider only tuberculosis and that only briefly as it is the subject of another paper.

This disease has filled the world with dread and despair. There has been but little in its treatment to bring hope to mankind. A few years ago the hope of the world was high raised by Koch's announcement that at last the long sought cure had been found. But the disappointment following its use was made all the more bitter on account of the great expectations that had been aroused. So much had been hoped for and prayed for that even the little that had been achieved was all but forgotten and neglected in the following years.

Only recently were the hopes of the unthinking and of the afflicted cruelly raised heaven high by the unblushing Friedman, to be blasted in despair.

There is however something of value in the tuberculin treatment. We now understand better the principles involved. It is a vaccine. Tuberculin infection is local; only the tissues immediately affected feel the impulse to active defense. By the use of tuberculin we call into play the tissues of the whole body and thus get concerted action. Every cell in the body is enlisted and the enemy is not allowed to attack the defensive forces in small and isolated detachments. Our whole force is called out to its full capacity, successful resistance is often possible. And tuberculin in the hands of those who know how to use it can give help. It is not for us all to use; only those with training and experience should undertake this treatment. I feel that we have great reason to be hopeful of better results from this source in the future in our fight against this dread disease.

Serum therapy is still in its infancy. Many facts have been worked out which in many cases as yet have not been correlated; much experimental work done that has not yet brought tangible results. But we are beginning to get hold of some fundamental principles; our vision is widening; our hopes with stronger wings mounting higher day by day. We feel that we are on the road to better things. The world is full of enthusiastic and untiring workers. In the distance we catch glimpses of the promised land.

*TYPHOID VACCINE.

J. W. ARMISTEAD M.D.,
SIDON.

Having imposed upon me a subject which I have neither used therapeutically nor had any practical experience with, I wish to say in the beginning that what I shall have to say will be principally from journals and other litreatnre along this line.

Typhoid vaccine, as you all know, is a twenty-four-hour cultnre of the typhoid bacillns grown on an inclined agar—suspended in physiologic solution to which has been added two per cent. trikresol as a preservative. This product is standardized by making a careful estimate count of the nnmber of bacteria to the cubic centimeter of suspension, and the organisms are killed by heating. This will practically cover the method of the preparation of any vaccine which is supplied on the market to-day.

After Pasteur had shown that it was possible to produce active immunity in animals against certain diseases, the thought naturally suggested itself that immunity could be and should be applicable to human beings. Attempts in that direction showed as a matter of fact that it was possible, not only by living cultnres, but even by killed organisms. The latter discovery is of course the greatest, as it made it possible for the application of killed organisms termed vaccines, to be used in the treatment of diseases, and especially to be used as prophylactic treatment, of which typhoid vaccines are essentially the outcome of actual trial.

The therapeutic application of typhoid vaccines at the present has been proposed by a nnmber of observers, but their value in treatment of typhoid fever is problematical, therefore my remarks will dwell principally on the prophylactic treatment.

This I can best do by giving you the actual experience of others by comparing the rate of morbidity from typhoid fever in a large body of vaccinated individuals who have been more or less exposed to infection, with that occurring in a similar body of men who have not been protected, and who have been exposed to a similar extent. We can further compare the rate of mortality among a body of non-vaccinated individuals with that of those who have been vaccinated, but have nevertheless

*Read before the Leflore County Medical Society.

developed the disease. Studies of this kind have been carried out in the English, German and American armies.

It will be recalled that in our Spanish war the morbidity and mortality from typhoid fever were perfectly appalling. In a body of 10,759 men there were 1,729 cases of certain typhoid fever, in addition to 964 cases of probable typhoid—making a total of 2,693 cases with 248 deaths. translated into percentages this means of the entire body of soldiers twenty-five per cent. were taken ill with typhoid fever or suspected, with a death rate of nine and two-tenths per cent. All these men were non-vaccinated. Compare with this the fact that among the 12,801 men who were concentrated in 1911 at the camps at San Antonio, all of whom had been vaccinated either before or soon after their arrival, there developed but a single case in a private who had not completed his immunization, and during the same time there were reported in the city of San Antonio forty-nine cases with nineteen deaths.

	Inoculated.	Uninoculated.
"Boer War, 1899-1902: (1)		
Number of individuals	19,069	150,231
Cases of typhoid fever:		
Number	226	3,739
Incidence per thousand individuals	11.9	24.9
Deaths from typhoid fever:		
Number	39	.....
Rate per hundred cases	17.3	25
Fatalities per thousand individuals	2.04	6.23
German South African troops, 1904-'06: (2)		
Number of individuals	7,287	9,209
Cases of typhoid fever:		
Number	371	906
Inicidence per thousand individuals	50.9	98.4
Deaths from typhoid fever:		
Number	24	116
Rate per hundred cases	6.5	12.8
Fatalities per thousand individuals	3.29	12.6
British Colonial Army to June 1, 1908: (3)		
Number of individuals	5.473	6,610
Cases of typhoid fever:		
Number	21	187
Incidence per thousand indiivduals	3.8	28.3
Deaths from typhoid fever:		
Number	2	26
Rate per hundred cases	9.5	13.9
Fatalities per thousand individuals	0.37	3.93"

Major Russell of the United States Army stated in 1911 that "dnring the last eighteen months we have vaccinated 12,644 persons and among them there have been five cases of typhoid fever and no deaths and during the same period there

has occurred in the remainder of the army 419 cases with 32 deaths. The rate per thousand among the vaccinated was 39, while in the army at large it was nearly ten times as high."

The reports of the Surgeon General in the *Journal A. M. Association* June 24th. 1911 adds more evidence to the already overwhelming testimony in favor of the protective value of antityphoid vaccination.

"With the memory of camp Chickamauga still fresh in our minds we are better able to appreciate the great strides which have been made in preventive medicine since the days of Spanish war—for during that campaign there were 20,738 cases of typhoid fever with 1,580 deaths and all within three and one-half months. Now, among the 18,000 who have been mobilized in the southwest border for over two months, living under usual camp conditions and where rain and mud prevails, the only case of typhoid fever which has developed has been that of a single teamster who was unprotected by vaccination.

The trial has now been made long enough and with such good uniformly results, it is time the procedure should be seriously considered by those who are not using the typhoid vaccine when opportunity presents itself.

It is generally conceded at the present time that three doses are required to establish immunity, although very satisfactory results have been obtained from two. Medical authorities advocate five million bacteria as a primary, to be followed by a second or third dose of double or more of the first given, and each administered at an interval of ten days.

According to reports from the U. S. Army, a mild reaction usually follows the administration of the vaccine which consists of slight fever and a feeling of malaise and other symptoms ordinarily following a mild intoxication. The local reaction consists of a reddened area of the skin and accompanied by some tenderness. The reaction occurs in a few hours after administration and may last from forty-eight to seventy-two hours.

The vaccine is administered subcutaneously in the usual manner—strict asepsis being observed.

In rare cases the reaction following an injection of typhoid vaccine is quite severe, but in no reported cases have permanent ill effects resulted. Persons not in good health should not be inoculated, neither should women at or near the time of menstruation. The presence of fever constitutes an absolute contraindication and especially malarial fever gives a severe re-

action. The drinking of alcohol beverages at the time of inoculation should be strictly forbidden.

On the basis of these findings it would appear that with modern sanitary methods, coupled with vaccination in case of those who are likely to be exposed to infection; typhoid fever should ere long become as rare in our hospitals. cities and small towns as small-pox and cholera at the present time.

*TUBERCULIN THERAPY

L. F. BARRIER M. D.,
GREENWOOD.

At least the profession and the laity realize that tuberculosis is being cured. but the role of the general practitioner in this field is an unenviable one. The wealthy class of his patients he rightly sends to the mountains to be trated in hospitals or colonies by physicians expert in this work. The poorer classes, the breeders of the plague, he turns away helpless, or with a few instructions as to personal hygiene and food and with a prescription for cod liver oil and creosote, leaving them to reinfect themselves, to infect their families and to become a source of danger to the higher planes of society. Thus the general practitioner becomes the pivot around whom revolves a vicious cycle.

Let us then throw off the lethargy into which we have fallen and apply ourselves anew to duty. We have sufficient clinical material at hand to become proficient in treating this disease. If we can become successful in treating pneumonia, when only one case out of every two hundred is pneumonia, we can certainly become successful in treating a disease which numbers among its victims one person out of every nine.

It is not tuberculosis but neglected tuberculosis that kills. Statistics show early tuberculosis to yield readily to treatment, but neglected tuberculosis to be almost invariably fatal. The first principle then in treatment is early diagnosis. This fact is not appreciated by the patient, but it must be by the physician, for delay is always dangerous. That tuberculosis is primarily a disease of the lymphatic system is clearly shown by the fact that the primary evidences of the disease are found in those tissues where the lymph is most sluggish, as in the apices of the lungs, the tracheo-bronchial mediastinal and cervical

*Read before the Leflore County Medical Society.

glands and in the tissues around the rectum. The bacilli gaining entrance through some broken mucous membrane are carried to the lymph nodes where they come in contact with the blood. Generally they are killed but sometimes they escape and multiply. Nature, roused, walls them off in the tubercles where they die or lie dormant until she becomes used to their presence and the phagocytes are no longer stimulated to activity by their toxin. Finding themselves tolerated by the protecting forces of nature they multiply, infect new areas and load the system with their poisons. If this is a gradual process, nature shows no resistance until too late. If there is suddenly thrown into the blood system an excess of toxins, nature rouses and walls them off. This process may occur again and again, giving the patient hope for a time but ultimately ending in death. Clinically these processes show themselves in relapses and periods of gain. The relapses being produced by overcharging the system with toxins; the periods of gain follow nature's battle against the infection.

If nature combats the disease by increasing phagocytic activity and in manufacturing an excess of antibodies to the tubercular toxin and this has been clearly proven to be true, then the only rational method of treatment is to use those therapeutic agents which will assist nature in her work.. These agents can be divided into five groups:

1st. Those restoring the natural resisting forces of the body, as food, air, sunlight, hydro-therapy and exercise.

2nd. Those agents which will artificially stimulate the phagocytes to greater activity, as the non-toxic suspension of the dead bacilli.

3rd. Those agents which increase the number of antibodies in the blood, as serums and the toxic products generated by the growth of the tubercle bacilli.

4th. Those measures which bring to the areas infected an increased amount of blood, as pulmonary gymnastics, counter-irritants and Bier's hyperemia.

5th. Medicinal agents used to relieve secondary or special symptoms.

As to the agents of the first, fourth and fifth groups I need to say little. We all know the necessity of food, air, sunshine, and proper exercise. I will only call attention to the necessity of emphasizing the value of these measures to your patient. Take charge of your patient's life, direct him what to do and how to do it.

The remedies in the second and third groups are the most important as to their curative value and in these remedies the general practitioner places the least value. The injection of dead typhoid bacilli increases the opsonic index against typhoid, the bacillus of erysipelas or pus organism against pyogenic infection, and Lawson and Stewart have demonstrated that the injection of dead tubercular bacilli raises the opsonic index of the individual to tuberculosis and the injection of the toxin increases cellular resistance to the disease.

If the phagocytes could never become reconciled to the presence of tubercle bacilli and their toxins, we would have no need to use agents which would stimulate them to greater activity; in fact we would never be called upon to treat tuberculosis at all, for the leucocytes would never cease work utnil the last germ was destroyed. But they soon become tolerant to the tubercular bacilli and only renew activity when the amount of toxins is suddenly raised. By suddenly introducing into the system,at intervals, enough of the dead bacilli and their toxins, we can keep phagocytic activity above par. Until within the last few years, tuberculin was given too often. A dose too large, or too often repeated, tends to paralyze the leucocytes instead of stimulating them. As long as there are inflamatory manifestations at the seat of the last injection, tuberculin should not be given, but as soon as these disappear a fresh supply should be injected. While presence of the dead bacilli in the tissues is stimulating, increases leucocytosis and raises the fighting power of the leucocytes, the members of the third group, the toxic products of bacillary life are stimulating the cells of the body to manufacture antibodies. We know that nature is prodigal in her attempts to cure; so that instead of enough to neutralize the poison which we have injected, she will manufacture antibodies in excess. Clinically this phenomenon manifests itself in a rise of temperature and a loss of weight. If the temperature rises over half a degree, or the loss of weight one quarter of a pound, our dose has been too large. These symptoms develop during the day of injection or the day following. The length of time taken for these developments after an injection is a fair index of the resisting powers of our patient. A swift reaction means strong resistance, a reaction after twenty-four hours denotes poor resistance to the infection. On the day following this loss of weight, the temperature will return to normal and the patient will have gained more than he lost and will continue to gain until the next in-

jection, if this is not given before all local symptoms have subsided.

In the administration of tuberculin, as in any other drug, no set rule can be followed. We must take into account idiosyncrasies, the condition of our patient and his environment. Generally I begin treatment with five minims of a one-to-ten-thousand solution made from Tuberclin Old, gradually increasing the dose until my patient can stand a dose of fifteen minims of a one-to-one-hundred solution. Some authorities claim that it is well to increase the dose until one cc. of pure tuberculin can be injected.

The length of treatment will dpeend upon the stage of the disease, the natural resistance to disease, the environment ,and the use of other remedies directed.

Current Literature.

THE CONTROL OF VENEREAL DISEASES.

At the International Congress of Medicine recently held in London, considerable time was spent in the discussion of the control of venereal diseases, and while nothing particularly new or startling was suggested, it was made very plain that much might be accomplished in the way of diminishing the spread of venereal diseases if they are attacked along the same lines of prophylaxis that are now so successfully used in controlling other infectious and contagious diseases. The cause and the treatment of gonorrhœa and syphilis are well known but owing to the nature of these diseases there has hitherto been a "conspiracy of science" on the part of the public regarding them and non organized public effort at repression has ever been made. The most important suggestion made, in our opinion, was that there should be provided in all communities ample hospital accommodations where those afflicted with venereal diseases may be given the advantages of modern methods of diagnosis and treatment, if they are unable to obtain them privately. In this way there would at once be furnished means of diminishing the spread of these diseases and of curing those afflicted with them more promptly. We doubt very much whether the resolutions adopted calling upon the governments of all countries to institute a system of confidential notification of venereal diseases will accomplish very much, but if at the same time provision is made to prevent all those who are not qualified to do so from treating these diseases, the notification

system may be of great value. In our opinion the venereal peril must be attacked much more radically than was suggested by those who took part in the discussion at the Congress, and before the radical measures which we have in mind can be adopted the education of the public regarding venereal disease must proceed to a far higher stage than has yet been reached. The business of prostitution must be conducted and controlled in a sane and sanitary measure before we can hope for much diminution in the amount of venereal disease. Since public prostitution cannot be suppressed, and we assume that it cannot, the woman engaged in that business must be recognized by the community as pursuing, if not a legitimate at least a perfectly legal occupation, and their business must be properly safeguarded and controlled. As soon as the legality of prostitution is provided for, all private ownership of property occupied by prostitutes should be abolished. The city should provide and maintain all the houses of prostitution and they should be properly policed and all liquor should be kept out of them. Once prostitution is divorced from graft and liquor, it has made a long stride towards decency, if such a word can be permitted in connection with it. Clandestine prostitution, the greatest of all sources of venereal disease, can and should be almost abolished. It cannot be absolutely abolished but it can be and should be reduced to a minimum. The next step in the attack upon venereal disease must be the dissemination of knowledge of prophylaxis against infection. The public prostitute, as well as those who consort with her, are anxious to escape disease and since it has been shown by the experience of the armies and navies of all nations that escape is quite possible even when directly exposed and that the methods to be used are simple and inexpensive, common-sense would seem to demand that they should be insisted upon in civil life. Intelligent and sanitary handling of the prostitution question and the general adoption of methods of prophylaxis against venereal disease are undoubtedly the two most important factors in controlling these diseases. We should not expect, in the present state of public knowledge and public opinion to have these suggestions received with much approval, in fact we should expect them to be met with a storm of disapproval and yet we believe that most physicians, certainly those who have given much thought to the matter, will agree that they are wise and sensible, and we are inclined to believe that the time will come when the people will think so too.—Editorial in *St. Paul Medical Journal.*

MISSISSIPPI MEDICAL MONTHLY.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

The first district organization in Mississippi was perfected in Greenwood, in February and while its geographical lines do not run as suggested in the By-Laws of the State Association, it apparently conforms in all essential respects and should prove of great benefit to its members. If we were to venture any criticisms it would be that the organization is not large enough and that one of its meetings, in the spring, is apt to run too close to that the State Association. Our idea for a district organization would be three meetings yearly: in January, July and October, the spring being taken care of by the annual meeting of the State Association and the membership should be somewhere near one hundred, about double what will be a conservative estimate for the new Delta organization. Not that fifty men can't make a good society, and especially when working out of two good towns like Greenville and Greenwood, but when we consider that the organization is for purely scientific purposes and we allow for forty per cent. failures to attend, a liberal estimate of attendance for we are pretty safe in saying that very few large societies will register over sixty per cent. of its membership at every meeting, we are convinced that the Delta District Medical Association will, in the near future, annex about two more counties, Bolivar and Tallahatchie most probably, and then they will furnish the numbers necessary to make things hum "for fair." The quality of the papers printed in this issue shows the class of work its members can do and we congratulate them on an undertaking that cannot but be of the greatest benefit. Incidentally we can't help feeling a little envious, especially of the Sunflower crowd—with membership in both the Clarksdale and Six Counties and the Delta District they are better fixed than anybody we know.

Society Proceedings.

County.	President.	Secretary.
Adams	J. S. Ullman, Natchez	M. Beekman, Natchez
Alcorn	C. M. Taylor, Corinth	W. A. Johns, Corinth.
Choctaw	W. D. Arnold, Ackerman	J. M. Kellum, Reform
Claiborne	W. D. Redus, Port Gibson	G. W. Acker, Port Gibson
Clarksdale and Six Counties		T. M. Dye, Clarksdale.
DeSoto	A. J. Weissinger, Hernando	J. M. Wright, Hernando
East Mississippi Four County	E. K. Guinn, Prairie	F. J. Underwood, Nettleton
Harrison	W. A. Dearman, Long Beach	D. J. Williams, Gulfport
Hinds-Rankin	R. S. Curry, Jackson	J. H. Fox, Asylum
Jackson	J. A. Tabor, Pascagoula	J. N. Rape, Moss Point
Jefferson	L. R. Harrison, Fayette	S. R. Towns, Union Church
Jones	J. R. Kittrell, Laurel	C. B. Clark, Laurel
Kemper	W. W. Holliday, Oak Grove	D. C. McLean, DeKalb
Lafayette	S. D. Newell, Paris	E. S. Bramlett, Oxford
Lamar-Marion-Pearl River	R. F. Nimocks, Poplarville	D. B. Stevenson, Lumberton
Lawrence-Jeff. Davis	J. P. Conn, Monticello	J. W. Wilson, Silver Creek
Leake	J. L. Parkes, Carthage	W. S. Martin, Carthage
Leflore	E. W. Hunter, Greenwood	W. B. Dickins, Greenwood
Marshall	A. M. McAuley, Marianna	W. C. Elliott, Holy Springs
Newton-Neshoba-Winston	D. J. Rush, Philadelphia	S. A. Majure, Dixon
Perry-Green-George	E. A. Denson, Agricola	S. L. Knight, Merrill
Pontotoc	Z. A. Dorsey, Troy	J. M. Furr, Pontotoc
Prentiss	D. T. Price, Booneville	R. B. Caldwell, Baldwyn
Scott	B. W. Sharp, Harperville	J. J. Haralson, Forest
Sharkey	L. E. Martin, Anguilla	A. K. Barrier, Rolling Fork
Simpson	A. F. Kyger, Pinola	J. L. White, Pinola
Smith	R. P. Boykin, Puckett	
Tate	J. I. Bucey, Senatobia	J. S. Eason, Coldwater
Tippah-Union	H. N. Mayes, New Albany	H. P. Boswell, New Albany
Tri-County	W. L. Little, Wesson	D. W. Jones, Brookhaven
Warren	J. S. Ewing, Vicksburg	J. S. Ewing, Vicksburg
Washington	U. S. Wasson, Moorhead	P. G. Gamble, Greenville

Delta District Medical Association. Following the meeting of the Leflore County Medical Society, which met in Greenwood, February 3rd. 1914, there was organized The Delta District Medical Association. On motion of Dr. T. B. Holloman of Itta Bena, seconded by Dr. A. G. Trotter of Greenwood,

this society shall comprise the members of the Medical Societies of Leflore, Washington, Issaquena, Sharkey, and such physicians of Sunflower as desire, and are eligible, and shall be an organization separate and distinct from our county and state societies.

On motion Dr. Paul Gamble of Greenville was elected temporary chairman, and Dr. L. F. Barrier of Greenwood was elected president of the new organization, and Dr. J. J. Ferguson of Greenville was elected secretary. Dr. E. W. Hunter of Greenwood, Dr. U. S. Wasson of Moorhead and Dr. W. H. Scudder of Mayersville were elected vice-presidents.

The executive and program committee consist of the presidents and secretaries of Washington and Leflore County Medical Societies.

The following were enrolled as charter members: E. G. Hamilton, Shell Mound; T. B. Holloman, Jr., Itta Bena; Malcolm Campbell, Greenville; A. G. Trotter, Greenwood; J. J. Ferguson, Greenville; U. S. Wasson, Moorhead; F. E. Barr, Sidon; W. T. Mathews, Greenwood; F. M. Sandifer, Greenwood; D. C. Montgomery, Greenville; J. W. Armistead, Sidon; S. L. Brister, Greenwood; J. W. Dulaney, Greenwood; W. B. Dickins, Greenwood; W. A. Burkhalter, Greenwood; H. L. Shannon, Itta Bena; W. H. Scudder, Mayersville; Paul G. Gamble, Greenville; L. F. Barrier, Greenwood; E. W. Hunter, Greenwood; J. A. Kennedy, Greenwood.

There will be two annual meetings, in the spring and fall, in Greenville and Greenwood, respectively, and there will be no dues, the local county society providing the entertainment. The next meeting will be held in Greenville, in April.

W. B. Dickins.

Book Reviews.

INTERNATIONAL CLINICS. A quarterly of illustrated clinical lectures and especially prepared original articles. Vol. IV Series 23. J. B. Lippincott Company, Philadelphia. Price $2.00.

Abrams' paper on "Augmented Blood Pressure" is unquestionably the most "worth while" in this number . Those on mechanical vibration, static electricity. interpretation of dreams, the psyche in diagnosis, constitutional immorality, the train of deaf-mutes, are too much in the nature of "borderland cases" for anyone doing everyday medical work.

E. F. HOWARD.

PRACTICAL SANITATION. A Handbook for Health Officers and Practitioners of Medicine. By F. Gardner M.D., Indiana National Guard and Medical Reserve Corps, U. S. Army, and J. P. Simonds B.A., M.D., Professor Preventive Medicine and Basteriology, University of Texas. Illustrated. C. V. Mosby Company, St. Louis. Price $4.00.

After a general discussion of infectious processes, the management of epidemics, isolation and quarantine, isolation hospitals and camps and disinfection, the authors discuss the communicable diseases seriatim from typhoid fever to barber's itch, considering each briefly but in sufficient detail to serve for quick reference. Part II describes vital statistics; inspection of schools, factories and public institutions; the carriers, rats, flies and mosquitoes; sewerage, garbage and food and water sanitation. Finally there is a brief description of the methods of taking and examining specimens in certain of the communicable diseases. The illustrations are for the most part taken from L. O. Howard and C. W. Stiles and are, practically all of them, familiar to the readers of these investigators and of the "Farmers' Bulletin." To the explanatory footnotes of two of these we wish to take exception: "An insanitary privy found too frequently on our farms. (After Stiles.)"—this is the well-known picture of the pig and chickens—and "The average style of privy found in the South. (After Stiles.)" These should read "(Before Stiles)"

E. F. HOWARD.

DIAGNOSTIC METHODS. By H. T. Brooks A.B., M.D., Professor of Pathology, University of Tennessee. C. V. Mosby Company, 801-6 Metropolitan Building, St. Louis. Price $1.00.

There is an outline of history and physical examination of a patient and of the ordinary laboratory methods. A good "crambook" for medical students.

E. F. HOWARD.

Typographical errors are sometimes rather amusing. We recently read one, without the context, to a friend: "In rape cases the reaction following an injection of typhoid vaccine is quite severe," and elicited the comment that these new-fangled diagnostic tests are getting pretty far-fetched, when all that the author intended to convey was that the reaction is quite severe in *rare* cases.

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*HARMONY IN THE PROFESSION.

J. A. DAVIS M.D.,
DOCKERY.

Directing my thoughts to this subject, it so fills my mind with the truths we as fellow-practitioners should observe, I find it difficult to determine how little to say, but find that we must touch on some points in medical ethics and emphasize the same, and I hope if any of us are derelict of our duty to each other along these lines, that we will resolve, right now, to get back in the straight path trod only by an ethical physician.

First: let us be ever mindful of the high character of our mission and in the discharge of our manifold duties we must never forget the responsibilities that accompany them. It behooves us to inspire in our patients confidence and trust in us, which can be done only by our skill, tenderness and strict attention to each individual case. Unlike any other profession, a physician without wishing to do so, invades the sacred precincts of domestic life, and is there admitted to the knowledge of the privacies of home. This knowledge should be guarded with all honor, and the strictest secrecy observed. When we forecast the course of a disease, which is not encouraging, but necessary for the patient to know, we should do so with great tact and wisdom, and as it is sometimes alarming when told by attending physician, this duty may be assigned to another purposes of this organization, which are for the maintainance cheerfulness and of avoiding remarks which will discourage or depress the patient.

As to our duties to each other, they too are manifold, and to keep our profession exalted we must be true to the principles and rules which govern us as members. Every physician who is within the bounds of this Association should join our ranks and become a loyal member, thus promoting the purposes of this organization, which are; for the maintainance of ethical standard, for the advancement of medical knowledge,

*President's Address before the Clarksdale and Six Counties Medical Society

for the exchange of professional experience, and in every way advancing the interests of our profession.

Let us eliminate malice from our ranks, and substitute brotherly love, which is the key to life, and its influences are those that move the world. Just so sure as we live in the thought of malice and hatred to one another, we may expect a return of them to us. "For evil poisons; malice shafts like boomerangs return, inflicting wounds, that will not heal while rage and anger burns," and when we fully realize the fact that selfishness is at the root of all malice, and that ignorance is the basis of all selfishness, with what charity we come to look upon the acts of all. Surely we are large enough to realize the fact that when we condemn unjustly another, by that very act we condemn ourselves. Now doctors, I am tired, Gray says I am. Above all things let us be above advertising our wares. Doctor, if you really think you are the big noise in your "Settlement," do so inaudibly. No matter how nice and delicately you may express your peculiar value, it will sound coarse to the intelligent. Sometimes in the absence of our colleagues we are called in to see their patients, these courtesies should always be performed with the utmost consideration for the interest and character of the absent doctor. In our consultations let us not indulge in envy, rivalry, or insincerity, but express our honest opinions always, maintaining the greatest respect for the physician in charge. Never give out unauthorized statements or discussion anent the case, but on the other hand, regard all discussions strictly confidential, at no time intimating that the course pursued did not meet your approval. It is a deplorable fact that we cannot always counsel and advise without offense. I read somewhere that "the doctor who injures a conferee by insulting the truth for personal profit is a much more culpable criminal than the ordinary addict of grand larceny, and of the hoard of liars in all professions, he is the most crooked and currish." Along in his class goes the Sardonic Doctor, who screws out that kind of a smile when anything is mentioned, the contradiction of which might revert to his advantage. It may be your diagnosis or treatment. The words of his speech are harmless, but his sour mug curdles those words. He is a native of this state, and thrives well in the Delta. When compelled by business, or it may friendship to visit one under care of some other physician, utmost caution should be observed in our conversation, taking care not to mention the nature of his case, remedies used, in

fact keep our conversation in other chanels until we know that the physician in charge has been dismissed, or for some reason has given up the case before we can be induced to prescribe and assume charge of the case. We cannot be just to our patients unless we are in harmony one with another.

He has achieved success who has lived well, laughed often and loved much; who has gained the respect of intelligent men and the love of little children; who filled his niche and accomplished his task; who has left the world better than he found it; who has never lacked appreciation of earth's beauty or failed to express it; who has always looked for the best in others and given the best he had; whose life was an inspiration; whose memory a benediction.

*THE MISSISSIPPI BUREAU OF VITAL STATISTICS.

HENRY SPENCER CAPPS M.D.,
GULFPORT.

It is not the object of this paper to enter into a full discussion of legislation that led up to the passage of the Act of 1912 authorizing the Board of Health to establish a Bureau of Vital Statistics in the State of Mississippi. I prefer to leave this to some one who is more familiar with its history. At present, I simply wish to present to the members of this Society a few facts in regard to the operation of the Vital Statistics law and to explain some of the results that we hope to obtain.

For more than a quarter of a century the medical profession of the State of Mississippi has felt the necessity of a law compelling the accurate collection and registration of all births and deaths occurring within the state. For many years the leading members of our profession have worked for the passage of such a law in this state. It was not, however, until 1912 that they succeeded in getting the legislature of Mississippi convinced of the necessity of such a law.

Previous to 1912, therefore, there was no state law providing for the registration of births and deaths occurring within the state. Several of the large cities, however, had passed ordinances providing for the registration of births and deaths occurring within the city limits and these cities today furnish the only Vital Statistics record available in the

*Read before the Harrison County Medical Society.

state previous to 1912. And although, Gulfport is the youngest of the cities of Mississippi, she was one of the first to recognize the necessity of a Vital Statistics law and I am proud to say that the Board of Health of the city of Gulfport holds a very complete record of births and deaths as well as contagious diseases since 1906. Our ordinance is still more complete than the state law, but of course we now have the satisfaction of being able to obtain the same information more or less from other cities and towns of the state.

The Act of 1912 provides for: (1) The establishment of a Bureau of Vital Statistics by the State Board of Health. (2) The registration of all births and deaths occurring within the state and the preservation of these records in fire-proof vaults at the State Capitol. (3) The reporting of morbidity statistics. (4) The appointment of a State Registrar with the necessary clerical assistants and his remuneration. (5) The division of the state into Registration districts and the appointment of local Registrars for each district. (6) The promulgation and adoption by the State Board of Health of such rules and regulations and orders as may be necessary to carry out and enforce this Act. The penalty for violating any of the rules or regulations of the Board of Health in regard to this Act, or for refusing or neglecting to report births or deaths, or for making false or incorrect reports to the Bureau is a fine of not less than five dollars nor more than one hundred dollars, or imprisonment in the county jail, or both, fine and imprisonment in the discretion of the court. The above Act was approved on March 11, 1912, and was to take effect and be in force from and after its passage.

On August 20, 1912, the State Board of Health met and adopted a set of rules and regulations governing the registration of births and deaths, the granting of burial and removal permits and the disposition of corpses as provided for in the above named Act. These rules and regualtions are issued in pamphlet form and may be had on application to the State Registrar of Vital Statistics at Jackson.

In order to appreciate the task that lay before the State Board of Health in establishing the Bureau of Vital Statistics in this state, it is necessary to have a general idea of the status of Vital Statistics in the country at large. The Fifteenth International Congress of Hygiene and Demography which met in Washington on the 23rd. day of September of 1912, revealed the fact that the condition of vital statistics in the United

States is far behind that of the other civilized countries of he world and in the langnage of its secretary, Dr. John F. Fulton "is not far from constitnting a national disgrace." The Director of the Census says in a recent publication: "it is both strange and shameful that the United States should be so far behind the other leading countries of the world in the matter of registration of births and deaths."

It is perhaps due to a want of uniformity of laws in the different states as well as to indifference on the part of the people that such a condition has existed in the past. The United States, the American Medical Association as well as many other agencies, commercial and scientific, are now at work in this country striving to secure adequate and uniform laws in all the states. In 1902 the Census Bureau adopted the United States Standard Certificate of death requiring a record of such item as were considered essential to a complete certificate. This Standard Certificate was revised by the American Public Health Association which revision was approved by the Census Bureau and recommended for adoption by the different states from and after January 1st. 1910. Prior to the adoption of the Standard Certificate no two states and hardly any two states in the United States had the same forms. The Census Bureau has also adopted what is known as the Registration area. Registration states are those in which in the opinion of the Bureau of Census at least 90 per cent of all deaths are registered. Non-registration states are those in which less than 90 per cent. of deaths are registered, or in which the adoption of the Standard Certificate has been too recent for the Bureau to judge of the completeness of registration. Nineteen states have adopted the Standard Certificate and have been included in the Registration area. Seventeen more states have already adopted the Standard Certificate, but have not yet been included in the Registration area. Four states have been included in the Registration area without adopting the Standard Certificate. Two states, Alabama and Illinois have refused to adopt the Standard Certificate and six states have state laws requiring registration.

It was the desire of the Mississippi State Board of Health after the passage of the Act of 1912 to place Mississippi in the number of Registration states. For this purpose, the Standard Certificate was adopted and Dr. F. L. Watkins, an expert in census work, was employed to establish an adequate system of registration in the state. It now remains for us to

prove to the satisfaction of the Census Bureau that 90 per cent. of our births and deaths are recorded. If this is accomplished, Mississippi will be the first state in the south to be included in the official Registration District.

To facilitate and systematize the registration work, the state has been divided into Registration Districts and Primary Registration Districts. Each city, town, village and election precinct constitutes a primary Registration District. The territory under the supervision of one local Registrar constitutes a Registration District and may be composed of one or more Primary Registration Districts—in my jurisdiction it is composed of two. Biloxi District is composed of three. There are twenty-two Registration Districts in Harrison county and thirty-four Primary Registration Districts. A local Registrar is appointed in each district who bears a commission from the State Board of Health and is empowered under the direction of this Board to file affidavits and enforce the law in his respective district. The local Registrar appoints a Deputy Registrar who acts in case of absence or disability of the Registrar. In case it becomes necessary for the convenience of the people, a sub-Registrar may also be appointed who makes his report to the Registrar. All births and deaths must be reported to the local Registrar within the time and in the manner prescribed by law. All reports must be made on the blanks furnished by the State Board of Health and must include the items required by this Board and must be written plain with unfading ink. The reports are copied by the local Registrar and forwarded with his report to the State Board of Health on the tenth of each month. No disposition can be made of corpses until a permit is obtained from the local Registrar and such permits are issued only upon death certificates filled out by a physician or coroner. When a body is shipped into the state for burial, the local Registrar may use the permit accompanying the corpse as a basis upon which to issue a new permit. All Physicians, midwives, undertakers and casket dealers are required to register with the local Registrar, who makes a report of the same to the State Registrar once a year.

In conclusion, I hope that this paper will serve to help you better to understand the operation of the Vital Statistics law in Mississippi; and, as one of the Registrars of Harrison county, I appeal to the members of this Society to co-operate with the State Board of Health, and help enforce the provision

of this law so that Mississippi may soon be included in the number of Registration States, approved by the Census Bureau.

*THE IMPORTANCE OF EARLY DIAGNOSIS IN UTERINE CANCER.

S. W. GLASS M.D.,
LYON.

Carcinoma may arise from any portion of the uterine mucosa. The variety of cancer corresponds to the type of epithelium from which it springs. From a diagnostic standpoint I will only mention two pathological varieties, namely: one type in which the squamous cells of the cervix have multiplied in an atypical manner and have involved the deeper tissues. This is the so-called epithelioma like that which occurs at the junction of the skin and the mucous membrane of the lips.

The other type, a cylindrical cell variety that multiplies in an atypical manner and involves interglandular stroma thus conforming to the scirrhus of infiltrating type. Carcinoma of the cervix usually originates near the os-externum where the cylindrical and pavefent epithelium meet. When it invades the deeper tissues the affected portion is enlarged, hard, marble-like and friable. This form, in my opinion, is frequently overlooked, especially in negro women who have borne several children and who are chronic sufferers from endometritis and prolapsed uterus.

The uterus is the commonest site of cancer in the human body, it is on this account that women die of cancer twice as often as men. The cervix uteri is four times more often affected than the body.

This malady seems to be on the increase in all civilized countries and certain districts where it is unusually prevalent. Duhrssen states that the deaths from cancer in Germany number twenty-five thousand annually. Another German author states that one per cent. of women between forty and fifty die of cancer and that there are more deaths from this cause than from labor.

Traumatism and a consequent long continued irritation and congestion are the most common predisposing causes of this trouble. The vast majority of the cases have a history of

*Read before the Clarksdale and Six Counties Medical Society. s-3

five or more labors. Heredity plays a subordinate part as a predisposing factor.

Less than one-fifth have a family history of cancer. In my opinion I want to lay especial stress on traumatism and constant irritation as a chief causative factor, rarely have I ever seen a case early enough that I did not find a lacerated cervix. We are all aware that the average negro woman only spends three or four days in bed after labor, as a result nearly all child-bearing negro women suffer from prolapsed uterus, and, as a result, the cervix uteri is more or less subjected to constant irritation.

Cancer of the uterus is most frequent between the ages of forty and fifty or about the menopause, therefore, most of their irregularities are attributed to this cause and we are rarely consulted until some of the symptoms become so severe as to cause alarm and by that time the trouble has passed beyond medical or surgical aid, only for palliative relief. And right at this juncture we too often overlook any slight symptoms that may be "signposts" to warn us of the prevailing danger. We are all more or less familiar with the chronic endometritis and chronic metritis that exist in the average negro woman and which symptoms strongly simulate the beginning symptoms of cancer of the womb, so we are in a measure excusable when we administer some "female tonic" and dismiss the patient from our thoughts, for most of them very reluctantly submit to curettment or any other slight surgical interference.

In this trouble they rarely complain of pain until the disease has invaded the body of the uterus, or at least while the cervix only is involved, therefore, when this symptom manifests itself the case is usually beyond surgical relief.

I deem it useless to dwell on different symptoms that arise from this trouble for everyone present is more or less familiar with same. Just at this point it might be well enough to mention some diseases that in some respects simulate cancer of the uterus, namely; myoma, benign adenoma, incomplete abortion, endometritis, sarcoma, syphilis, chronic metritis, tuberculosis uteri. In making a correct diagnosis, of course, the microscope will clear all doubt, but this is not always obtainable. The plan of treatment is more or less familiar to all. If not too advanced resort to surgical methods, if this is not advisable adopt such palliative measures as in your judgment is best suited to prolong life.

In conclusion, I wish to state that my purpose in writing this brief paper is to impress everyone present with the importance of a careful examination, regardless of meagre and apparently trivial symptoms.

*TUBERCULOSIS, THE PHYSICIAN, AND THE LAITY.

HENRY BOSWELL M.D.,
ASSISTANT DIRECTOR PUBLIC HEALTH AND SANITATION STATE OF MISSISSIPPI.

In selecting this broad subject for a paper to read before this Association, I am not choosing a scientific one, but a paper that is given with a sole purpose and that is, to try and stimulate an organized fight against the Great White Plague in our state, and to substitute some scientific work for the haphazard work of the disorganized kind.

It may be said that I am prejudiced because of once having had the disease (if you will pardon a personal reference), but if I am, it is in a good cause and for the ones in this state that happen to the same misfortune, so the criticisms that I shall offer in this will be of the kind to stimulate a good feeling between the physicians of our state and to establish a better understanding between the doctor and the laity.

Tuberculosis is very prevalent to-day in our state, and is without a doubt on the increase, yet it should not even be present because our state is rural and admirably located for complete extermination of the disease. We are losing about four thousand people each year, it is costing the state more than eight millions of dollars annually, it is present in all walks of life, and the death rate among our negroes, who are in the majority, is appalling, yet we have the negroes in our homes, they nurse our children, they cook our food, they clean our houses, and in turn they feed us and our little defenseless children tubercle baccilli at our tables, our drinking fountains and expectorate them by the billions on our floors to be breathed by ourselves, children and grandchildren who come to live in our homes. Now in the face of these facts what can be said of our physicians in the fight? The doctors, the men who are supposed to watch over their respective communities whether it be town or country, the men who have chosen the profession of the great and illustrious and lamented Dr. Koch, who led the professional world from darkness to

*Read before the East Mississippi Four County Medical Society.

light, who made possible the fight against this most powerful of all human foes that has hindered civilization for centuries, yet it must be said that these same physicians have been satisfied to take the work of Dr. Koch and sit down with it expecting all of the ignorant laity to do the same and inform themselves as the physicians have done. In other words we might term it an *ingrowing disinclination* to work.

In the past few months pellagra has come to the front in the south, much has been said and little accomplished in the fight against it. In this state one seldom meets a physician that doesn't mention it, now without trying to make pellagra seem to be unimportant let us compare the argument, we have only a few hundred cases in Mississippi with a comparatively low death rate, and in this same state we have thousands of cases of the white plague with a high death rate and little is said by the profession and practically nothing by the laity. May I be allowed to ask why this condition obtains? The answer would have to be the mystery that surrounds the cause of pellagra appeals to the doctor and the universal belief among the laity that it is some kind of leprosy and strikes terror to many of them and to some of our profession. Should our profession allow hysterical exictement to undermine their good judgment and cause them to depart from the steady course they should pursue in the great calling of saving human lives?

Some one asks why all this criticism of our noble profession? To urge or to stimulate our physicians of this state to study tuberculosis, to look for it in its early stages when the patient has yet a chance for his life. To get out of the habit of visiting a patient, looking at his tongue, taking his temperature and feeling his pulse and in a matter of fact indolent sort of way tell him that his "liver is out of order," or better, falling back on the poor old abused plasmodium malariæ, and reflecting upon the character of the pretty female genus anopheles (remember to be polite to the ladies even the lady mosquitoes.) Now in all seriousness let us examine the patient, use every effort to find the cause of illness which could be easily done in many cases thereby adding to the patient's chance for a recovery and to the reputation of the attending physician. Let us illustrate: a patient comes into our office with this history: Doctor, for the past few weeks I have been feeling very badly and have lost considerable strength and a pound or two in weight, I have no appetite, have headaches, feel dull and stupid, can't sleep well and have some pain in

one shoulder and my knees seem to give out under me, sometimes I feel a little chilly and think I have some fever. The Doctor sometimes will ask this: do you cough? Answer: sometimes when I have a cold. Then he takes the temperaeure and finds it a little below normal or above, and without further examinations says: "Biliousness" and prescribes the usual mild chloride, etc., followed by quinine sulphate. Result: patient continues the same, he is next treated for stomach trouble, and finally become disgusted and goes the rounds of all the doctors with the same results then the *patent medicines* and back to some doctor several months later an advanced case of tuberculosis, and the last Doctor without a question says go west and takes his departure without telling the family how to prevent further spread.

The patient in the meantime has gone west and died, but not before he has told the expert, if he was fortunate enough to fall into one's hands, that he was treated here several months for malaria. Hence our profession is known by the expert as a chronic malarial one. During all this time several more of the family have picked up the infection and will go the same route.

Then we have another doctor, who tells the patient to spit in any kind of a bottle or on something and bring it down and he will send it to the State Board of Health and have it examined. Request complied with, a negative report, the doctor tells Mr. So and So that he positively does not have tuberculosis, it must be malaria or a stomach trouble. The patient dies in a few months from tuberculosis and the Laboratory comes in for its share of the abuse and is blamed for the whole thing, when as a matter of fact it is taught in all of our Laboratories that a negative examination is worthless even when repeated, and at best is usually a late sign.

Gentlemen, you, I see, are asking if this condition really exists in our profession. It does and I am sorry to say is in the majority. While I was in the west I was constantly embarrassed by the jokes at our expense regarding maiarla, and was asked with the usual sarcastic accompaniments if I had been having malaria for some time. I know one little lady that spent several months in an institution for nervous diseases, and from there was turned over to the surgeon for an operation on the stomach to relieve a stomach trouble, when all of the time she was having a temperature and the usual symptoms of tuberculosis. She lost all chances for a recovery

or rather some of our profession lost it for her. I would quote another case which would more than illustrate my point, but caution forbids, I will be glad to give it privately.

Now, gentlemen, in the face of all this let us here try to carry some of this to the men who do not attend the meetings and usually makes the blunders. Let us try to make a diagnosis, discard the clumsy instruments that I see in use that would perhaps be alright to examine a steam engine, but not the human being. Let us get down to business. And after we have found the case, be reasonable, try to do the right thing that will give the patient a chance for a recovery and will prevent the loss of life among the future people and our children. When we have a chance let us try to show the poor ignorant negro; whether there is a compensation or not, money is not the only compensation in the world for work. Make each home where there is an infection a little school with yourself the supreintendent, and then will we command the respect of the laity.

The physician to handle tuberculosis must be tactful, he must be firm and yet cheerful to command the respect necessary to get control of the patient.

The laity is fast becoming enlightened on the subject and we have now reached a stage where we can successfully fight the fakir, who to-day is drawing fifteen millions annually from the patients of this country.

Our state is taking up the work and will no doubt in the near future be able to give to the physicians that help which will mean so much to them in controlling the home people. But after all we must have co-operation between the physicians and the laity or all is lost.

We must be more careful in sending people away from home. We hear doctors make the positive statement that this disease cannot be cured in this country, yet according to the experts we have a most excellent climate for the successful treatment and when we get our people to see this and to realize that after all climate is only a part of the cure then will we have the co-operation among our people that will stamp out tuberculosis.

I wish I had time to tell you of the many sad mistakes I have seen made by people in leaving home, but will wait another opportunity.

In conclusion let us join in an effort to further the work made possible by Dr. Koch helping here and there with the

sole idea of a benefit to our future generations and remembering that after all life is short, but during that time we may make the world say when we have passed to the "Happy Hunting Ground" that we have fought a good fight and deserve the reward of the good physician. Let them bow their heads as our remains pass in the slow procession and say: "Our doctor has gone to a place where he will not be troubled, and he leaves behind his people who have loved him because of his care of them, he made few mistakes and those few did not cost a human life, they were trifles, may his successor profit by his honesty, integrity, carefulness and thoughtfulness in his practice and be to us a good doctor."

*INFLUENZA.

J. O. GURNEY M.D.,
TUPELO.

Influenza is an acute contagious disease, which develops in a very short period of time, often within twenty-four hours after exposure, though there may elapse several days.

It was thought for quite a long time that the disease was principally air borne, but the most recent investigation has shown that the organisms are spread by contact.

The organism which produces influenza was discovered by Pfeiffer in 1892 and is of a dumb-bell shape, and is found in the secretions of the nose and throat. Zeihl's solution is the stain which shows the organism best.

There is no special pathological lesion of this disease and the catarrhal inflammations of the mucous membrane of the nose, throat and respiratory tract are the chief manifestations.

The symptoms are very numerous as well as varied, depending upon the severity and type which the disease takes.

Usually the onset begins with malaise and slight catarrhal condition of the nose and throat, very much the way of a common cold, and for the first twenty-four hours there is but little difference in the symptoms, though there begins a rachialgia very severe at times and an intense frontal headache.

The temperature is not over 100° F. though the patient appears very much sicker than the temperature would indicate. There is a marked prostration all out of proportion to the physical findings.

*Read before the East Mississippi and Four County Medical Society.

The diagnosis is not very difficult to make when an epidemic exists, and these occur quite often in this country, though sporadic cases are frequently hard to differentiate. There have been about five distinct invasions of this country and each time there has been a very rapid spread throughout the continent, showing how susceptible individuals are to this organism. Scarcely any escape its course.

The restlessness and nervousness which accompany influenza are very characteristic in the severe type. Relapse are frequent and on the least provocation. Too early getting out of bed and exercise are the causes of relapse.

To say nothing of the severity of this disease the complications deserve our attention as physicians.

Pneumonia is a frequent complication and this type of pneumonia is very difficult to treat. There seems to be an exudate that is intercellular and a solidification of the lung that remains long after the symptoms of the disease has subsided.

With the eye a catarrhal inflammation occurs in a great many of the epidemics. The conjunctivitis if taken at the outset responds to treatment.

Otitis media coming on within the first few days with but little pain, if any, there being a gradual diminution in the sounds and inability to hear distinctly. This should arouse our suspicion of an otitis media.

Purulent pleurisy is another thing which we should be on the lookout for, the pain in the side does not mean every time that we have a pleurisy but along with the other symptoms we should not overlook this complication of influenza.

not overlook this complication of influenza.

The influenza bacilli are most often accompanied by the streptococci and staphylococci, which accounts for purulent secretions.

The treatment is largely symptomatic as the disease is so protean in type. Purgatives and rest, however they may be best secured, are the first requisites.

Twins of Different Races.—In the course of his practice at Munich, Nurnberger had his attention attracted to this subject by having to deliver the twins of a white woman married to a "black man." One child was a typical Caucasian, the other a pronounced mulatto. He discusses the history of such occurrences and cites various examples on record, including to the belief that Mendel's laws of heredity will explain them, without the necessity of assuming superfetation.—*Journal A. M. A.*

MISSISSIPPI MEDICAL MONTHLY.

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OFFICIAL ORGAN OF THE MISSISSIPPI STATE MEDICAL ASSOCIATION AND ITS COMPONENT SOCIETIES.

SUBSCRIPTION ONE DOLLAR PER ANNUM.

Arrangements for the 1914 meeting are now completed and it is up to the members to do the rest—by going. The program, already in the hands of the members, promises an unusual amount of interesting work and although we have heard some remarks anent the difficulty of getting to Columbus we can assure everybody that this is more imaginary than real.

Since there have been inquiries regarding rates, we give the regulations under which the reduced fare is secured:

To delegates and members surrendering certificate-receipts secured from and executed by agents at starting points April 9-15, inclusive, 1914, signed with ink by Dr. E. F. Howard, Secretary, and vised by Ticket Agent, Mobile & Ohio Railroad, Columbus, Miss., Special Agent, evidencing the payment of tariff fares from starting points to Columbus, Miss., and also evidencing their attendance at this meeting, tickets for their return journeys will be sold by the Columbus, Miss., agents of the Mobile & Ohio Railroad and Southern Railway in Mississippi on any date up to and including April 20, 1914, at rate of one-third of the first-class fares then current from Columbus, Miss., to the stations at which the certificates were issued, plus 25 cents.

Reduced fare returning: to stations in Mississippi only. Note: no tickets will be sold reading over the Alabama Great Southern Railroad, or New Orleans Great Northern Railroad.

No certificate-receipt evidencing the payment of less than 75 cents for a ticket to Columbus, Miss., will be honored.

Should a delegate or member en route to Columbus, Miss., purchase a ticket to a junction point and there repurchase to Columbus, Miss., securing a certificate-receipt showing the purchase of each ticket, he (or she) should have each such certificate-receipt duly executed by Dr. E. F. Howard, Secretary, and vised by Ticket Agent, Mobile & Ohio Railroad, Columbus, Miss., Special Agent, and present all such certificate-receipts to the agent authorized to sell the return ticket, which said agent will take up all such certificate-receipts evidencing purchase of ticket covering journey from original starting point to Columbus, Miss., and sell return ticket through to original starting point at the rate authorized herein.

For the benefit of those members who will travel on the N. O., M. & C. we print the following, received just as we go to press:

Mobile, March 20, 1914.
File 10944-B.

MR. E. F. HOWARD, Secretary,

Mississippi State Medical Association, Vicksburg, Miss.

DEAR SIR:—Passenger Rates account Mississippi State Medical Assiation Columbus, Miss., April 13-16, 1914.

Your letter March 7th.

We will authorize sale of tickets from our stations in Mississippi to Ackerman or Mathiston, Miss., on the certificate plan, basis one and one-third fare plus 25 cents for the round trip.

We cannot sell through to Columbus, Miss. Your delegates must therefore purchase tickets from our Junctions to Columbus, Miss., in order to complete their journey.

Tickets will be sold April 9th. to 15th. inclusive 1914. good returning on any date up to and including April 21st. 1914, at rate of one-third of first class fare, current from Mathiston or Ackerman to station at which certificates are issued plus 25 cents.

Certificate-receipts must be signed in ink by you as Secretary and vised by Ticket Agent of M. & O. R. R. Co., Columbus, Miss., as evidencing payment of tariff fare from our stations to Ackerman or Mathiston.

A copy of our instructions to Agents will be furnished you when issued.

Yours truly,
W. L. O'DWYER,
Traffic Agent.

Members travelling this road will therefore, when leaving home, buy tickets to Ackerman or Mathiston, taking a certificate. Then at the junction they will buy another ticket, to Columbus, and take another certificate. Both certificates will be signed by the secretary and be used when purchasing the return transportation. By this method the round trip will be made for one-and-one-third fare plus fifty cents.

WHOOPING-COUGH.—Ritter in *Dental Med. Wochenschrift* says that nourishing food and out-of-door life are the main reliance in treatment of whooping-cough, with sedatives as indicated, but he protests that by out-of-door life he does not mean necessarily a change of air. This can be realized at home without the necessity for spreading the infection in another place. If a change of scene is necessary, all precautions must be taken to refrain from infecting others and for this, he says, only direct contact need be avoided as he is convinced that the contagion occurs through the sputum alone.—*Journal A. M. A.*

Society Proceedings.

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Adams	J. S. Ullman, Natchez	M. Beekman, Natchez
Amite	W. R. Brumfield, Gloster	R. M. Butler, Liberty
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Calhoun	G. G. Armstrong, Vardaman	C. W. Patterson, Pittsboro
Choctaw	W. D. Arnold, Ackerman	J. M. Kellum, Reform
Claiborne	W. D. Redus, Port Gibson	G. W. Acker, Port Gibson
Clarksdale and Six Counties	J. A. Harris, Webb	T. M. Dye, Clarksdale.
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Clay-Lowndes-Oktibbeha	S. S. Thomas, Maben	B. J. Marshall, A & M. Colleg
Covington	H. F. Garrison, Seminary	R. B. Wallace, Arbo
DeSoto	A. J. Weissinger, Hernando	J. M. Wright, Hernando
East Mississippi Four County	E. K. Guinn, Prairie	F. J. Underwood, Nettleton
Forrest		W. R. Bethea, Hattiesburg
Harrison	W. A. Dearman, Long Beach	D. J. Williams, Gulfport
Hinds-Rankin	R. S. Curry, Jackson	J. H. Fox, Asylum
Issaquena	T. A. Heath, Shiloh	W. H. Scudder, Mayersville
Jackson	J. A. Tabor, Pascagoula	J. N. Rape, Moss Point
Jefferson	L. R. Harrison, Fayette	S. R. Towns, Union Church
Jones	J. R. Kittrell, Laurel	C. B. Clark, Laurel
Kemper	W. W. Holliday, Oak Grove	D. C. McLean, DeKalb
Lafayette	S. D. Newell, Paris	E. S. Bramlett, Oxford
Lamar-Marion-Pearl River	R. F. Nimocks, Poplarville	D. B. Stevenson, Lumberton
Lauderdale	T. D. Bourdeaux, Meridian	G. F. Douglas, Meridian
Lawrence-Jeff. Davis	J. P. Conn, Monticello	J. W. Wilson, Silver Creek
Leake	J. L. Parkes, Carthage	W. S. Martin, Carthage
Leflore	E. W. Hunter, Greenwood	W. B. Dickins, Greenwood
Madison	V. S. McLellan, Canton	J. R. Jiggitts, Canton
Marshall	A. M. McAuley, Marianna	W. C. Elliott, Holy Springs
Newton-Neshoba-Winston	D. J. Rush, Philadelphia	S. A. Majure, Dixon
Perry-Green-George	E. A. Denson, Agricola	S. L. Knight, Merrill
Pontotoc	Z. A. Dorsey, Troy	J. M. Furr, Pontotoc
Prentiss	D. T. Price, Booneville	R. B. Caldwell, Baldwyn
Scott	B. W. Sharp, Harperville	J. J. Haralson, Forest
Sharkey	L. E. Martin, Anguilla	A. K. Barrier, Rolling Fork
Simpson	A. F. Kyger, Pinola	J. L. White, Pinola
Smith	R. P. Boykin, Puckett	
Tate	J. I. Bucey, Senatobia	J. S. Eason, Coldwater
Tippah-Union	H. N. Mayes, New Albany	H. P. Boswell, New Albany
Tri-County	W. L. Little, Wesson	D. W. Jones, Brookhaven
Warren	J. S. Ewing, Vicksburg	J. S. Ewing, Vicksburg
Washington	U. S. Wasson, Moorhead	P. G. Gamble, Greenville
Winona District	J. W. Young, Grenada	S. S. Laruthers, Duck Hill
Yazoo		S. W. Purifoy, Yazoo City

Clarksdale and Six Counties Medical Society met at the Elks' Club, Clarksdale, Wednesday, March 25th., the following being the program:

Afternoon Session—Two O'clock.

1. Leukæmia: A Clinic.....T. G. Hughes, Clarksdale
2. Report Of Some Unique Cases..W. S. Slaughter, Jonestown
3. Placenta Prævia: Report Of A Case .....O. A. Davis, Lyon, R.F.D.
4. Convulsions In Children.....L. D. Harrison, Clarksdale
5. Convulsions In Infancy And Childhood: Report Of Some Cases.....A. W. McNeal, Ruleville
6. The Mississippi Health Campaign.....H. Boswell, Jackson
7. Membranous Croup.....J. J. Howell, Cleveland
8. Pellagra In Children.....E. R. McLean, Cleveland
9. Quinine Amaurosis In Children.....W. M. Biggs, Rome

Evening Session—Seven-Thirty O'clock.

1. Election of Delegates.
2. Miscellaneous Business.
3. President's Address.
3. President's Address.....J. A. Harris, Webb
4. The Use Of Emetine Hydrochloride In The Treatment of Amœbic Dysentery: Report Of Cases .....S. F. Neal, Marks
5. Appendicitis And Its Complications .....H. A. Gamble, Greenville
6. Modified Circumcision.....N. Yeates, Jeffries
7. Some Observations On The Etiology And Treatment Of Corneal Ulcers.....A. C. Lewis, Memphis
8. Carcinoma Of The Breast.....L. W. Haskell, Jr., Memphis

Dr. L. C. Feemster,

President 1913-14.

TUPELO.

Dr. L. C. Feemster was born near Nettleton, Miss., Sept. 28th. 1873, his parents being Dr. Wm. O. and Margaret (Foster) Feemster. He was educated in the county schools and had two years of college work, after which he studied pharm-

acy, graduating from Lebanon University and working two years as a pharmacist before taking up the study of medicine. He first attended lectures in Baltimore but later went to Memphis where he graduated in 1897 and spent the following year as House Surgeon at St. Joseph's Hospital. Four times since then he has done post-graduate work in Chicago and New Orleans. Leaving Memphis in 1898 Dr. Feemster settled in Nettleton where he remained until last year, when he moved to Tupelo.

Dr. Feemster was carried in Nov. 1900 to Miss Johnie McGaughey and has three children, two boys and a girl. He became a member of the Presbyterian Church in 1896, and has been an elder in the same since 1911.

*The *Monthly* regrets that we are unable to publish the photograph of the president as we have done for some years past. We asked for it repeatedly, beginning in December, but got it too late to have a cut made. However, we wish to assure those of our readers who do not know him that he is an unusually good-looking young man.

Obituary.

Dr. Chesley Daniel of Holly Springs, died March 2nd. The following is taken from one of the newspapers of that place:

"A pall of gloom came over our little city Monday evening when the news was spread of the sudden death of Dr. Chesley Daniel at his home.

"Dr. Daniel fell about a month ago and fractured his hip but it had been set and placed in a cast.

"After spending two weeks in the hospital in Memphis he had returned home apparently getting along nicely. He spoke of feeling much better Monday and had eaten dinner when suddenly his heart began to weaken and he died in less than ten minutes.

"The funeral services were held from the Methodist Church Tuesday evening by Rev. I. D. Bowers and Rev. W. N. Duncan, and the remains were laid to rest in the family lot in Hill Crest.

"Dr. Daniel was sixty-five years old and had been a practicing physician in Holly Springs for nearly forty years.

"The large concourse of friends who gathered in the Methodist Church to pay a last tribute to him was a fitting evidence of the high esteem in which he was held.

"Every seat in the church was packed and there were as many more on the outside. More than a wagon load of flowers were sent to be placed upon the mound beneath which rested the remains of this beloved physician, who for nearly a half a century had alleviated the suffering, ushered into life some, and spoken consoling words of Christian comfort to others who were past the need of earthly remedies. Dr. Daniel was a consistent, conscientious member of the Methodist Church and the recording steward. He was a man such as we will not soon see his like again.

"He survived by his wife, one son, Mr. J. Fort Daniel, and two daughters, Mrs. Voorhes Thorne and Miss Lucy Hill.

"The family have the sympathy of the entire community in this great bereavement."

At a meeting of the Marshall County Medical Society held in this city March 3, 1914, the following resolutions were passed:

WHEREAS, The Great Physician and Healer of Bodies and Souls has deemed it best to remove from among us our Companion and Brother Physician, one beloved by both the profession and laity, and of the highest esteem as a Christian gentleman, Dr. Chesley Daniel; therefore be it

Resolved, That with sadness in our hearts we bow with reverence to the mandate at Divine Will, and beg to offer to the members of his bereaved family the sympathy of this Society; and be it further

Resolved, That these resolutions be spread upon the minutes of this Society, and a copy be transmitted by the Secretary to the family of our departed Brother.

ROBERT A. SEALE M.D.
W. C. ELLIOTT M.D.
Committee.

Dr. Daniel was a native of Marshall County, received his preparatory education at the University of Mississippi and was graduated in medicine from Tulane in 1872. He served as county health officer and as a member of the State Board of Health.

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Vol. XVIII. OCTOBER 1913. No. 6.

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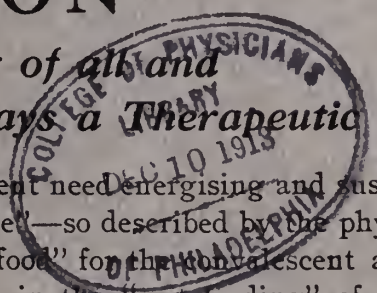

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MISSISSIPPI MEDICAL MONTHLY

OFFICIAL ORGAN OF
THE MISSISSIPPI STATE MEDICAL ASSOCIATION
AND ITS COMPONENT SOCIETIES.

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